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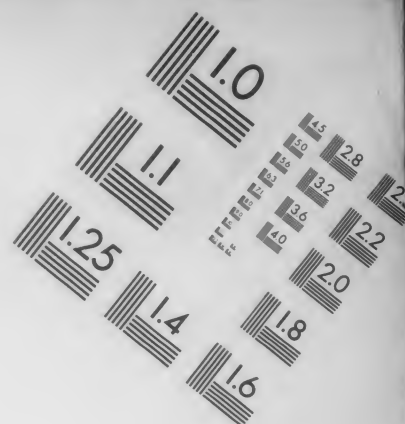
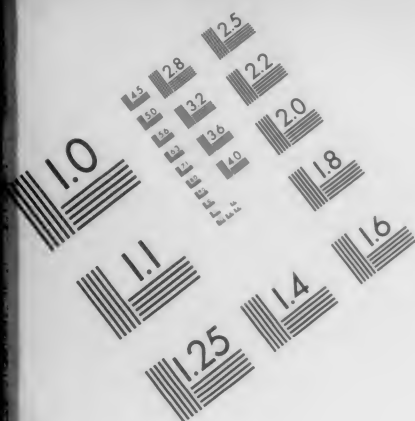


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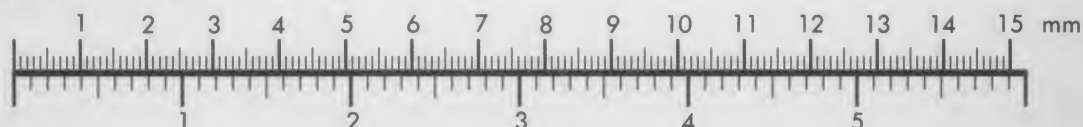
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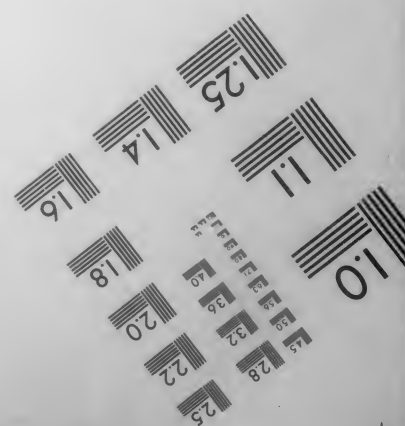
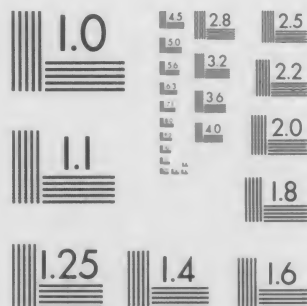
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PRAGMATIC ELEMENTS IN KANT'S PHILOSOPHY

A DISSERTATION

SUBMITTED TO THE FACULTY OF THE DEPARTMENT OF ARTS AND
LITERATURE IN CANDIDACY FOR THE DEGREE
OF DOCTOR OF PHILOSOPHY
(DEPARTMENT OF PHILOSOPHY)

BY
CHARLES EDGAR WITTER
||

CHICAGO
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PREFACE

Pragmatism is "a new name for old ways of thinking"—some of the old ways. Its mission and its merit consist, then, not in introducing an entirely novel standpoint, but in helping to disentangle the functional, dynamic viewpoint from the remnants of rationalism or intellectualism contained in most philosophical systems, whether they be of the idealistic or the materialistic order.

Pragmatism was practically influential long before it was recognized as a mode of philosophy. It was operative in ethical and educational theory. A decade ago Dewey rendered a service in the critical study of logic by showing that there were functional elements in Lotze. Addison W. Moore made a similarly valuable contribution in his comparison of the representational and functional aspects of Locke's *Essay*—a contribution that was immediately reviewed by Schiller. Doubtless this contrast between a practical conception of the real work of thought as one of the factors in human development and the copy view of ideas might be found in any one of the historic philosophers, indeed might be traced far back into the roots of historic development in the Greek thinkers.

The undertaking to study Kant's system from the pragmatic standpoint was made from several considerations. Kant himself was the clearing-house for a vast amount of antecedent and contemporary thought. His very effort to mediate between a raw empiricism and the old scholastic dogmatism indicated that he appreciated the difficulties in either standpoint and wished to find a way out. Technically he remained a rationalist but he was the initiator of an epoch that issues legitimately in the modern dynamic attitude toward truth and reality. Kant points two ways—toward idealism and toward pragmatism. It was the "transcendental" in his system that long obscured the functional and led his followers off on the wrong path. The influence and the interpretation of that "transcendental" are today not far from the firing-line of philosophical debate and advance.

The pragmatic movement, moreover, is constantly brought into comparison and relation to Kant whether we will or no. The very terms "practical reason," "theoretical reason," and the contrast between them are his invention. The "postulates of the practical reason" is a phrase so strikingly similar, even in sound, to the principles of pragmatic

inquiry that it is on the lips of pragmatic thinkers constantly. It arouses the feeling, even without accurate analysis, that Kant realized, after all, the true nature of thinking as an active process growing out of life itself. Yet it has been assumed by many that Kant's system stands for the fixed and the unmodifiable in thought and reality. A clear exposition of his functional leading, if it be contained in his work, should be of aid not only to pragmatism in giving it historic dignity, but also to a true estimate of Kant's place in the development of human thought and life.

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INTRODUCTION

Kant's criticism was the center from which may be traced, roughly speaking, three lines of development. One main line took its rise from Kant's teaching regarding the a priori functions of the theoretical reason. This line culminates in Hegel and the neo-Hegelians. Its essence consists in abstracting Kant's thought-forms and making them absolute; in explaining content as determined by form; in affirming a logical reality higher than that appearing in the world of experience. A second main line may be traced to Kant's doctrine of the primacy of the practical reason. This movement is represented by Fichte and Schopenhauer who developed two aspects of Kant's conception of will. For Kant, will seems to be a complex of two factors: first, inclination or desire, and secondly, reason as setting up ideals and putting them into action. A double line of voluntarism appears in Fichte's connection with the second of these factors, an aspect of his thought not covered by his idealism, and in Schopenhauer's attachment to the first factor. Schopenhauer, taking his point of departure in the Kantian distinction between "thing-in-itself" and "appearance"—a distinction which absolute idealism in its own way sought to obliterate—endeavored to find in his own soul life a piece of reality given, existing in the form in which we know it. From this piece of reality Schopenhauer thought we could infer the whole reality by analogy. He would use the insight won in a psychological way as a "regulative principle," to adopt Kant's phraseology. For this principle the practical reason, not the theoretical, is the source. The conflict between intellectualism and voluntarism is solved in Schopenhauer by subsuming under will all psychical occurrences, but the rationalistic element in his thinking asserts itself in his adherence to a unity as the ultimate ground—a unity still conceived in an abstract-logical sense. The third main line of development boasting its lineage from Kant is empiricism. Passing by those problems upon which Kant placed such great worth, and fortifying itself upon that feature of the Kantian thought which affirmed that knowledge is limited to the empirical world, empiricism has ignored the treatment of the "Transcendental Aesthetic" and the "Transcendental Analytic" and has turned back gladly to Hume.

Pragmatism enters the arena with a clear title of its own. Reacting strongly against the absolutism of the first main line of development, it

assumes the rôle of a better empiricism. Empiricism itself had shown a strongly marked intellectualistic disposition, failing utterly to do justice to the organism's reaction upon its environment. Pragmatism transplants empiricism to the region of voluntarism and is thus in better position to overcome the opposition between Kant's rationalism and his empiricism than was any movement of thought that has yet appeared since the epoch of criticism itself. It may safely be affirmed that in pragmatism philosophic thought moves in the direction from Hegel back to Kant. For while the faithful follower of Hegel may assert that his genesis of the categories is more pragmatic than Kant's given, fixed categories, it is all too evident that in the end this supposed genesis lacks any genuine quality. As Sturt says, "A changeless development is not merely a difficult conception; it is downright nonsense."¹ All of the apparent development in Hegel and the neo-Hegelians is merely the phenomenal unfolding of the timeless absolute idea, which is the sole reality. For pragmatic purposes thought must move back to the vantage-ground of criticism, to gain a fresh start in the study of the properly constructive character of mental activity, to see the function of knowledge as one of the factors in reality. It cannot be committed to a plan given and finished in advance. Pragmatism is deflected at times from this straight backward path, in tracing its historic origins, not only by its antipathy to the rationalistic elements latent in criticism itself, but also by its affinity for the results of modern psychology which were either unknown to Kant or were at no time in the focus of his attention.

If it can be shown that the salient features of the pragmatic attitude are contained either explicitly or implicitly in Kant's thinking, several distinct points will be gained for the pragmatic movement and, possibly, for the interests of real intellectual progress. First, it may appear that the critical movement of thought was not a mere waste, to say the least; that we do not, as James has suggested, have to short-circuit the great German thinker, though it may result that we have short-circuited some of the idealistic systems that succeeded him. Secondly, it may be seen that pragmatism is not a mere by-path from the main road of philosophic development, but preserves the line of historic continuity and sequence. Thirdly, by finding and accrediting itself in the great thinker who stands historically as the gateway to modern thought, pragmatism may at least challenge the right of absolute idealism to usurp the leadership over the philosophical world, to claim for speculative philosophy the sole key to

¹ *Idola Theatri*, p. 186.

reality and the meaning of things. Fourthly, in revealing the arrogance of pure intellectualism generally, it may serve to show the weakness of that form of scientific investigation—so called—that was provoked in opposition to speculative systems—the craving for mere blind facts—and may lead thought back to the vantage-ground of modesty with which the effort of criticism set forth originally. The oft-repeated cry, "Back to Kant," may be found to have vital significance.

That there are close resemblances between pragmatism and Kantianism is apparent even to the casual reader. As George A. Coe remarks, "From the historical side pragmatism appears as a new presentation of empiricism, or a new development of the Kantian doctrine of the primacy of the practical reason as against the theoretical."² The most naïve student, when he reads of the *Will-to-Believe* and of Kant's postulates of the practical reason is moved to exclaim, "How very modern this Kant is after all." The relation of pragmatism to criticism is forcefully suggested in Schiller's declaration that if Kant had been twenty years younger when the full significance of postulating dawned upon him he would have rewritten his great work from the avowedly pragmatic standpoint. How close or how loose some of these intimated comparisons and relationships are we hope to discover as we proceed.

Historically, two systems of thought met in Kant—rationalism and empiricism. It is our conviction that throughout his thinking two systems or aspects are apparent—the transcendental and what we moderns designate as the functional or the pragmatic. In his "transcendental" we see the influence of inherited rationalistic assumptions from which he was unable wholly to escape; but when we come to examine his use of the transcendental—the practical application of it when it has any meaning—we come upon distinctly pragmatic tendencies. Kantianism, relieved of transcendentalism, yields virtually pragmatism. Kant stands with his face toward the modern, functional view of life and reality, even when he is unable to express himself to that effect in the letter of his terminology.

It would, of course, be idle to ignore, at the outset, the too static character of his system. He antedates evolution and the biological approach to the problems of psychology and life. To be sure Paul Carus thinks that Kant—particularly the young Kant, the Kant of the first edition, the author of the *Presumable Origin of Humanity*, of the treatise, *Upon the Different Races of Mankind*, and of *The General History and Theory of the Heavens*—leaned strongly toward the evolution

² *Methodist Review*, 1908, p. 212.

hypothesis; that he recognized "neither the stability of species nor any fixed limits between them," and that "he discusses the origin of the species of man in a way which would do honor to a follower of Darwin."¹ But while the younger Kant, in his most scientific moods, may have had fitful foregleams of the evolution of species and of the survival of the fittest, there is, unfortunately, "no evolution in his categories" when he sets himself to his great work in the examination of knowledge. In common with the ancients who rightly held that ultimately the problems of science and metaphysics are identical, he wrongly considers his concepts fixed and unalterable—"these and this exact number only." Yet with all his dogmatic background and environment it may still be indicated that the epoch opened by him in the evolution of thought extends legitimately through all the one-sided systems that have attempted to complete his work and reaches our most modern dynamic conception of thought and life; that he was essentially pragmatic in his view of the nature of truth, the criterion of truth, and, possibly, the nature of reality.

His rationalistic inheritance from the past appears in his separation of sense and understanding and in his retention of things-in-themselves. He practically accepts with Hume the isolated, relationless sense elements which require to be combined for knowledge. To be sure, after he has laboriously shown how these are combined by the forms and categories of the mind, he virtually repudiates them and proves that they could never have existed in the abstracted, relationless form in which he sets out with them. He seems, however, never to discover the full meaning of this truth. A deeper study of this important fact would have helped to square him completely with the modern functional viewpoint. The transcendental deduction assumes in its premises what it emphatically denies in its conclusion. To get unification he thinks we must introduce a transcendental element—spaceless and timeless; yet, having assumed in the "Transcendental Aesthetic" these atomistic entities, he turns around and rejects them in the "Transcendental Analytic." This would seem to imply that the desired unity may be attained without the transcendental element. Had this separation been less sharp in his mind to begin with, the thought implicit in his entire system might have reached explicit recognition, namely, that sense material has connections of its own, or otherwise speaking, that sense material standing by itself is a mere abstraction, an unwarrantable assumption. Kant and the objective idealists who followed him assumed that whatever is distin-

¹ *Kant and Spencer*, p. 42.

guishable is separable. All idealistic systems need this assumption to make out a case, and when the assumption is exposed, their case tumbles. Their problem is how, out of a congeries of atoms, to get an experience, but as Dewey well says, "That red, or far and near, or hard and soft, or big and little involve a relation between organism and environment is no more an argument for idealism than is the fact that water involves a relation between oxygen and hydrogen. It is, however, an argument for the ultimately practical value of these distinctions—that they are *differences* made in what things would have been without organic behavior—differences made not by consciousness or mind, but by the organism as the active center of a system of activities."¹ Kant makes an artificial separation between his sense-impressions and his concepts which he says are pure. The real distinction between the two is functional and may vary with the situation. Kant seems to use it as an ontological distinction hard and fast. Instead of taking the experience just as it presents itself—datum and meaning included—he first puts his sense-qualities and his concepts into tight compartments. This is not always the case, as we are endeavoring to point out, but in the "Aesthetic" especially he treats his a priori elements and his empirical elements as actual entities, existing in independence of each other, prior to their union by the transcendental forms. All transcendentalists make the same mistake. Bradley, for instance, says that in our sensation of black certain relations of comparison and discrimination are constituents. He forgets that this is true only when we begin to ask questions about it. He says these relations are present transcendently, as did Kant. He substitutes the black of the discriminated experience as the situation from which we get our notion of what quality is and then equates the two experiences. That is, he takes a situation where datum and meaning have been developed, where the discriminated and related qualities are experienced in *reflective analysis* and throws this back into situations of the non-reflective sort. Sense content does not mean anything apart from relations of meaning, but, says Bradley, the sense content is not created by these relations of meaning, hence intellect can do nothing with it and we have contradiction. He does not realize that in making the distinction between the sense-elements and thought we have changed the character of the experience; that when experience is thus transformed we have experienced datum and experienced meaning. He overlooks the fact that in our actual experience there is no datum other than that of meaning. Just so Kant takes a sense-impression, abstracts it from

¹ *Essays Philosophical and Psychological in Honor of William James*, p. 66.

its concrete situation, and makes a formal unity of it. He does the same with thought or with his concepts.

Despite this separation on the part of Kant, however, there is a near approach to the pragmatic method in his three-fold synthesis of apprehension, reproduction, and recognition. He moves away from crude realism and in the direction of functionalism in arguing that, instead of our cognition conforming to objects, objects must conform to our mode of cognition. At the very outset of the "Aesthetic" he lifts space and time out of the hands of every form of crude realism although he makes it rather easy for them to lapse into the arms of absolutism. Pragmatism takes one of its chief inspirations in breaking away from the representational view of knowledge—the view that our scientific ideas are exact copies of external or trans-empirical realities. Kant would seem to be in harmony with this attitude in holding that the mind furnishes constituent factors—helps to build its own ideas of natural science. He differs from the pragmatist in abstracting sharply this work of the understanding in thus furnishing the relating factors. He sees that the mind contributes something to the determination of the object—so far pragmatic. He cannot grasp the full truth that the perception of the object is just one whole piece of experience. It was the false separation left between datum and meaning that offered the opening wedge for idealistic systems. Kant says or implies that all experience is not self-conscious but *potentially* self-conscious. This implies a set of relations not in experience, and just here we have the root of Bradley's puzzles, as has been indicated. From this spring T. H. Green's efforts to bring relations and sense-impressions together. Green identifies knowledge with *all relationships* and finds, therefore, that it is not derived from nature. Elsewhere Green uses knowledge as a mere temporal function. This confusion and error in his thought is plainly attributable to the influence of German idealism. As Sturt says, "Kant's influence led him to make an absolute separation between the synthetic consciousness and the empirical stream, and to say that the synthetic consciousness is changeless or out of time entirely."¹ He and all the absolutists use knowledge in the two senses. Knowledge as a temporal function is forgotten, its dynamic and purposeful implications are ignored, and hence the metaphysical riddles.

¹ *Essays Philosophical and Psychological in Honor of William James*, p. 240.

SPACE AND TIME

In Kant's treatment, first of all, of space and time—the fundamental forms of or rather *for* perception—he has both a transcendental and a functional use. To experience things in space and time we must have a space and time into which to put them. Therefore they are not derived from experience but are preconditions. In the "Aesthetic" he says: "Time is not an empirical conception. Time is given a priori."² Yet he elsewhere remarks: "Time is nothing in abstraction from the conditions of sensible perception."³ If he had stopped to ask himself the meaning of this functionalism, to analyze and elaborate the significance of this contradiction, he might have been led farther on the path of the instrumental character of knowledge. Holding the mathematical viewpoint, he stresses the continuity aspect of these forms, failing to notice sufficiently that from the practical viewpoint they receive their content from discrete objects and events. Other expressions, however, are not wanting to contradict his notion of an intuition of an objective time as an infinite necessary continuum: "Time is nothing but the form of our own internal intuition. Take away the peculiar condition of our sensibility, and the idea of time vanishes, because it is not inherent in the objects, but in the subject only that perceives them."⁴ If the latter statement is true, accepting for the moment its subjectivistic characterization, we scarcely need the subsequent debate in the "Antinomies" as to our ability to imagine time either as ending or as going on forever. For our purposes we want neither to go to the end of time nor to divide it up into infinite atoms. Our conception of time is adequate for all the purposes to which we need to put it and this is implied in the outcome of Kant's discussion of this antinomy, namely, that only the one use of it, the functional, phenomenal, will ever benefit us. "What it does determine is the relation of ideas in our own inner state."⁵ Bawden well says: "Antinomies result from the attempt to conceive empty space and time apart from the concrete experience where they have meaning. We cannot perceive empty space and time, but only objects and events. Pure space and time are artifacts like 'the average child' or 'the economic man.'"⁶ Kant, in his summation of this matter, swings back to his

² Watson, *Selections*, p. 30.

³ *Ibid.*, p. 34.

⁴ *Ibid.*, p. 35.

⁵ *Ibid.*, p. 32.

⁶ *The Principles of Pragmatism*, p. 273.

transcendental use and yet, even in that very use, implies the functional application of it to make any sense: "Phenomena have, therefore, no existence apart from our consciousness of them: and that is what we mean by their transcendental ideality."¹ Again he declares: "Transcendental 'Aesthetic' cannot count the concept of change among its a priori data, because time itself does not change, but only something which is in time. For this, the perception of something existing and of the succession of its determinations, in other words, experience, is required."² Here he grasps the fact that it is change, succession that really afford the perception of time, yet he abstracts time itself as a concept. He does not pause to realize the necessarily concrete character of change.

Similarly, of space, he writes: "Space is not an empirical perception which has been derived from external perceptions. Space is a necessary a priori idea which is presupposed in all external perceptions."³ He says we experience space as a unity. Here he evidently confuses mathematical and psychological space. We may *conceive* space as a unity, but we actually experience only individual spaces. So true is this that, as James says, "Most of us are obliged to turn round and drop the thought of the space in front of us when we think of that behind."⁴ Later on Kant himself says: "Space and time are *quantia continua*, because no part of them can be presented that is not inclosed between limits (points or moments) and therefore each part of space is itself a space, each part of time is itself a time. Space consists only of spaces, time of times. There is no way of proving from experience that there is empty space and empty time";⁵ and very significantly for our present purposes in his *Metaphysical Elements of Natural Science*, where he must necessarily touch upon the real value of this form or category, he adds: "The absolute void and the absolute plenum are in the science of nature pretty much the same thing as blind chance and blind fate are in metaphysical cosmology, namely, a bar to inquiring reason. Everything that relieves us from the need of taking refuge in empty space is a real gain for natural science."⁶

Thus he first dogmatically assumes space and time as ontological realities, or if not quite ontological realities as transcendental idealities—yet, when it comes to concrete experience, which it must be noticed

¹ Watson, *Selections*, p. 173.

² Mueller's Trans., p. 33.

³ *Ibid.*, p. 18.

⁴ *Metaphysische Anfangsgründe der Wissenschaft*, IV, 427.

⁵ *Psych.*, II, 275.

⁶ Watson, *Selections*, p. 98.

is his only sphere of knowledge, space and time reduce to merely empirical cash value. Or, if this is held to be not antecedently the only alternative, what are space and time if not pure forms? He treats them sometimes as pure forms, sometimes as something else. He inevitably raises this question, which remains unanswered.

It seems highly significant, in Kant's whole treatment of space and time and particularly of space, that he resorts constantly to mathematics for an illustration of necessary a priori forms of knowledge and, as someone has remarked, it is always to pure mathematics, making no distinction between it and applied mathematics. It may reasonably be held that if Kant had placed less rationalistic confidence in the a priori certainty of mathematical knowledge, he would have succeeded in shifting the emphasis from *constitutive* to *regulative* in the treatment of all his forms and categories, instead of limiting the latter to certain "ideas of reason." It seems deplorable that his criticism could not, at the outset, have been turned to a more minute and genetic inquiry into the real character of geometry. He says:

On the necessity of an a priori representation of space rests the apodictic certainty of geometrical principles and the possibility of their construction a priori. For if the intuition of space were a concept gained a posteriori, borrowed from general external experience, the first principles of mathematical definition would be nothing but perceptions. They would be exposed to all the accidents of perception, and there being but one straight line between two points would not be a necessity, but only something taught in each case by experience. Whatever is derived from experience possesses a relative generality only, based on induction. We should therefore not be able to say more than that, so far as hitherto observed, no space has yet been found having more than three dimensions.¹

Along with Descartes he accepts mathematics as the ideal of scientific method. Particularly in his *Prolegomena* Kant practically contradicts his real critical position in this respect. In accepting and so readily explaining mathematics and physics as actual and valid bodies of knowledge that need no epistemological examination and vindication, he virtually abandons his critical ground and takes for granted what he started out to prove critically. His convenient straight line itself should have been subjected to a more severe genetic examination. Ladd says:

If one wants to know what a straight line is actually, one must draw it by an act of constructive imagination. But Kant does not emphasize the truth that such drawing of a straight line is quite impossible for a mind that has not

¹ Mueller's trans., p. 19.

previously traced some line, as seen or felt, actually limiting a thing perceived by the senses. That is to say, the grounds for the construction of a straight line, on which the foundations of all the mathematics of the geometrical order and all the mathematical sciences themselves are standing, are given only in the cognitive judgment which terminates a series of sense-perceptions. This process is an envisagement by thinking mind of the nature of the really existent as given to it in the object of sense-perception. What is true of those processes that constitute the actual experiences in which we come to the knowledge of the properties of a straight line, is true of all the experience which furnishes the other primary conceptions and axioms of geometry. As a science, a system of cognitions, it is not a mere product of imagination or of thought, much less of mere aggregated sensations or of associated ideas. It is rather a product of the entire mind in its actual living commerce with things.¹

In this "living commerce with things," however, the pragmatist would take care to remind us that the mind is not restricted to mere envisagement, as this statement of Ladd might seem to imply. The mind's true rôle is rather that of reconstruction than of envisagement. Both mind and things are efficient factors in the outcome. A crude realism would emphasize only the things, leaving to mind the empty task of copying. Kant swings to the other extreme and seems to attribute to mind the power of constructing things regardless of any give and take, in the transformation of meaning through conflict and reconstruction. The truth is, of course, that neither thing nor mind is alone the determining factor.

Kant was powerfully influenced by the recent development of mathematical physics in his day. He declares: "The science of mathematics presents the most brilliant example of how pure reason may enlarge its domain without the aid of experience."² Again he says: "Since in any doctrine of nature only so much of real science is contained as there is knowledge a priori, every doctrine of nature will constitute a real science only in so far as mathematics can be applied to it."³ In his reaction from Hume's skepticism he swung so far from the empirical attitude that he wanted to put the whole process of knowledge, or as much of it as he possibly could, into the mind's constituent forms themselves. But for this reaction he might have glimpsed the fact that mathematical science is as empirical ultimately as are the other sciences. He might have anticipated John Stuart Mill in recognizing that mathematical judgments have in the last analysis an empirical genesis, that

¹ *Philosophy of Knowledge*, pp. 259, 260.

² Mueller's trans., p. 572.

³ *Metaphysical Elements of Natural Sci.*, Preface.

"axioms are experimental truths generalized from observation," or better, as the pragmatist would again amend, truths reached by the mind in its movement back and forth between observation and ideas, in the formation or re-formation of hypotheses. It was Mill's weakness at times to postulate a raw material of pure sensational data, forgetting the important fact indicated by himself in other places, that the positive aspects of scientific inquiry require the assistance of the mind's hypotheses, of ideas, to keep the "facts" from being meaningless or inadequate. Mill saw clearly, however, just in this connection, that the idea must develop within the same experience in which the facts play their part. Kant's confidence that the steps of the great mathematicians like Newton "became a highway on which the latest posterity may march with perfect confidence"¹ might have been rudely shaken could he have foreseen the efforts of a non-Euclidean geometry, coupled with its appropriate non-Newtonian mechanics, to describe our world as exactly as the Euclidean can do it. In the words of Lobachewsky, "We cognize directly in nature only motion, without which all the impressions our senses receive become impossible. All other ideas, for example geometric, though tied up implicitly in the properties of motion, are artificial products of our minds; and consequently space, by its own self, abstractly, for us does not exist."² If Kant had been less cavalier toward the psychological aspects of his problem, he might have realized, as have later thinkers, that geometry arose originally out of man's interest in the spatial relations of physical bodies about him, numerous facts testifying to its empirical origin; and that its development cannot be made intelligible apart from consideration of these. "The perception of space as a continuous whole goes back to such empirical elements as sensations of movement, sight, touch, the statical sense of the semicircular canals, the power of orienting the body with reference to presented stimuli."³ The unitary conception of space resulting from all these factors is a complex phenomenon and is determined by the sensory factors that contribute to it. This is evidenced by the fact that psychological spaces which correspond to the different senses are not entirely identical. The unitary space-perception of a man blind from birth is of one sort and that of one of unimpaired vision is of another sort. Different forms of geometry have developed in accordance with these differences of sensory material and have been characterized as

¹ Mueller's trans., p. 583.

² Lobachewsky, *New Principles of Geometry*, p. 15 (Ed. Bruce Halstead).

³ Ladd, *op. cit.*, p. 229.

motor, visual, etc., as they have placed chief emphasis on one or another of these sensory factors. Euclid's geometry is largely motor. Projective geometry is visual. Moreover these psychological distinctions have played no inconsiderable part in the discussions as to the validity of these competitive systems of geometry.¹

We might digress at this point also to say that Kant's confidence in the growing science of mathematical physics, the other field on which he drew for illustrations of necessary a priori judgments, might have been similarly shaken if the discoveries of radium and uranium had occurred in his day, and he would have been spared the error—in opposition to Hume—of getting too much fixity in his judgments, even allowing for his scrupulous care to adhere to general principles and not to pass over to specific laws. When such universally accepted rubrics as the atomic theory find themselves partly, at least, discredited by the advance of science, it is well not to try to make our physics too mathematical. It may be as difficult to apply mathematics in this rigid way to physics as Locke found it was to apply that science to ethics and for just the same reason, namely, because the facts are not all in or because the facts actually change. From the pragmatic or functional standpoint the facts in any science are only provisionally or tentatively given. Nothing can be said to be absolutely fixed, unless it be the fact of struggle, growth, purposive endeavor. Facts change, or if this seems harsh to the realist or the idealist, what seem to be unquestionable facts actually change, and for human experience this comes to the same thing. Truths are relative to the conditions, situations, problems in connection with which they take their genesis and as solutions for which they are formulated. When these problems and conditions change so-called truths are reformulated *pari passu* with the changes or advances. The so-called facts and truths of a given age come, therefore, to bear all the ear-marks of postulates or hypotheses. With a forward look and for the purpose they serve they are true and seemingly eternally true. From the backward look of succeeding ages they are revalued and often superseded. This is the fact of history, whatever may seem to be the verbal difficulties in the appraisal of them and of the fact.

But, returning to Kant's own treatment of space, we find that he inevitably moves away from the transcendental to a functional statement himself whenever he approximates the real value of this category.

Space does not represent any quality of objects by themselves, or objects in their relation to one another; i.e., space does not represent any determination

¹ Withers, *Euclid's Parallel Postulate*.

which is inherent in the objects themselves, and would remain, even if all subjective conditions of intuition were removed. For no determination of objects, whether belonging to them absolutely or in relation to others, can enter into our intuition before the actual existence of the objects themselves, that is to say, they can never be intuitions a priori. It is therefore from the human standpoint only that we can speak of space, extended objects, etc. If we drop the subjective condition under which alone we can gain external intuition, that is so far as we ourselves may be affected by objects, the representation of space means nothing. For this predicate is applied to objects only in so far as they appear to us, and are objects of our senses. Our discussions teach, therefore, the reality, i.e., the objective validity, of space with regard to all that can come to us externally as an object, but likewise the *ideality* of space with regard to things when they are considered in themselves by our reason, and independent of the nature of our senses.²

And since these independent things have utterly no significance for us, the meaning of space is limited to its functional use, whatever may be true of its genetic development. Kant adds:

We maintain the empirical reality of space, so far as every possible external experience is concerned, but at the same time its transcendental ideality, that is to say, we maintain that space is nothing if we leave out of consideration the conditions of a possible experience, and accept it as something on which things by themselves are in any way dependent.³

In these utterances we have clearly stated the contradictory elements of the functional and the transcendental. Inasmuch as Kant constantly shows the futility of talking about an object outside "the conditions of a possible experience," we are warranted in holding that the only really valuable ingredient in his whole treatment of space is the functional—that which pertains to space "with regard to all that can come to us *externally as an object*." Even in the phrase "externally as an object" we have, of course, an abstraction the futility of which Kant is aiming all along to show. He does not realize the pitfalls into which he is betrayed by his own abstract terms. It was long ago pointed out that this manner of separating the elements of "poor sensation" and of mental powers is a work of mythology.

My space-intuitions occur not in two times but in one. There is not one moment of passive, inextensive sensation, succeeded by another of active extensive perception, but the form I see is as immediately felt as the color which fills it out. That the higher parts of the mind come in, who can deny? They add and subtract, they compare and measure, they reproduce and abstract. They inweave the space-sensations with intellectual relations: but

² Mueller's trans., pp. 20, 22.

³ *Ibid.*

these relations are the same when they obtain between the elements of the space-system as when they obtain between any of the other elements of which the world is made.¹

Kant's mistake here as elsewhere in his "*Anschauung* with necessity" is in holding to a sensation-atomism, the view that originally a thing of sensation is given in consciousness which must first be brought into an orderly connection by the intellect. Yet what his whole *deduction* establishes is the fact that in sensation we have just one whole organic experience, that sensation existing by itself, apart from experience, is a meaningless expression.

It is worthy of repetition, however, that Kant removes at one fell stroke the whole structure of naïve realism in this treatment of space and time. He says: "If we take away the subject, or even only the subjective constitution of our senses in general, then not only the nature and relations of objects in space and time, but even space and time themselves disappear."² In the words of Watson, "Kant rules out the doctrine of Newton that space is a real thing, the doctrine of Locke that it is a property of real things, and the doctrine of Leibnitz that it is a relation of real things."³ In amendment of this the pragmatist would add simply, of real things as abstracted from our own mental needs and activity.

To recapitulate, then, we find Kant oscillating between the two uses of his fundamental forms of perception—space and time. Rightly repudiating an empiricism that resolved experience into unrelated atoms leaving in reality no experience whatever, he seeks a way of securing unity. To do this he thinks it necessary to introduce a transcendental element—spaceless and timeless. His argument proceeds not by introspection but by formal reasoning. Assuming, in contradiction to all that he is setting himself to prove, that original sense-elements do exist in this primordial condition, he clamps down upon them his transcendental forms of space and time. He conceives space as a unity, holding unconsciously the mathematical viewpoint and failing to note the psychological development of our actual space experiences. His argument is valid only if we concede the premises—the original unrelated elements. Pragmatists do concede the fact of unity but deny the need of the transcendental. Kant himself exposes the weakness of his original assumption in proceeding to show that space and time are never

¹ James, *Psychology*, II, 275.

² *Aesthetic* (Mahaffy's trans.), II, 59.

³ *The Philosophy of Kant Explained* (larger work), p. 90.

found as empty concepts, as mere preconditions to sensible experience, but as inevitably fast bound up with concrete material itself, as invariably functioning in situations of experience which preclude an abstraction of sense-elements on one side and forms of perception on the other. He does not, however, reach explicitly the pragmatic insight that our starting-point is neither non-temporal nor supra-temporal, but experience just as we find it.

THE MIND'S CONSTRUCTION OF NATURE

Kant's unconscious shifting from the transcendental to the functional runs through his twofold use of the categories in his "Deduction of the Categories," and his essential agreement with pragmatic doctrine, in so far as he keeps to the proper use of his concepts, comes to light in his teaching of the mind's determination of nature.

Kant realizes clearly the difficulty involved in regarding the work of thought as merely reporting, representing, or pointing at an external, fixed reality. It is precisely this realization that leads him to introduce a transcendental logic, as over against the traditional analytic logic of the schools. He wants synthetic, not merely analytic judgments. With Locke he feels the need of something more than "trifling judgments." He wants thought to go forward and it cannot move onward if its task is merely to record something ready, given. In accounting for synthetic a priori judgments, in the deduction of his categories, he does just what this latest movement of philosophic thought has made prominent, namely, he shows that thought is constructive, that it functions in determining experience, and that it is the *conditio sine qua non* for an orderly, harmonious experience. He declares: "When we speak of the categories being necessary for our experience, what do we mean by experience? We mean a great complex, embracing a vast number of objects, and we also mean the legitimate and orderly connection of these objects into a great harmony or unity."¹

His very theme has a pragmatic tone—How is experience possible? He substitutes for the Greek objects (as Windelband terms them) given objects of which knowledge is the copy—experience, or what he calls phenomenal appearance. He does not seem to realize that in the phenomenal itself we may get real objects, the only objects that can be real for us, although this is implicitly suggested over and over in his thought. Indeed it is in places more than suggested. He does not actually oppose "phenomenal" to "real." In refuting idealism he expressly says in one place that the phenomenal does not exclude reality, but from the pragmatic standpoint he weakens this assertion by adding, "We cannot possibly know the thing by the senses as it is in itself."² This involves an assumption that pragmatism does not make. But we are concerned now to see his pragmatic concessions. The old analytic logic, he says, dealt only with the forms of thought. Transcendental

¹ *Prolegomena*, p. 65.

² *Ibid.*, p. 43.

logic will enable us to determine the positive contents of knowledge. We want not merely a criterion of consistency, we want a criterion of truth itself. We want not merely to lay down the negative conditions of knowledge (although this is what the limited application of his revolution of thought amounted to in his first *Critique*), but we want to make positive advance in scientific information. How pragmatic this all sounds.

Pragmatism and Kantianism agree that we ourselves help to make the reality which we know. When Kant asks, How is synthetic a priori knowledge possible, the answer runs that we know the part of reality which we ourselves make out of pure reason, without experience. But he reiterates that the only reality we do make and know is experienced reality. Pragmatism defends the view that we construct our reality—our orderly world—step by step, starting with provisionally given facts and postulating one hypothesis after another as ordering principles. Kant makes no attempt psychologically to detail the operations by means of which our thinking builds reality, but his ground principle that we participate in the process is sound pragmatic doctrine. At this point James raises a protest: "Superficially this sounds like Kant's view, but between categories fulminated before nature began, and categories forming themselves in nature's presence the whole chasm between rationalism and empiricism yawns. To the genuine Kantianer, Schiller will always be to Kant as a satyr to Hyperion."¹ This expresses what others have deemed to be one of the greatest differences between Kant and the pragmatist. It overlooks, however, the fact that Kant is not concerned with the psychological problem of the genetic origin of the categories, but with the epistemological problem of their value and function in experience. We are far from denying that it is precisely a genetic psychology that Kant needs in many places, but in his own justification he explicitly says: "We are discussing not the origin of experience, but of that which lies in experience. The former pertains to empirical psychology, and would even then never be adequately explained without the latter, which belongs to the *Kritik* of cognition, and particularly of the understanding."² A little concession on Kant's part to "the origin of experience" would have helped him to be more dynamic, less mechanical and structural. It would have enabled him to carry his Copernican revolution of thought out to its legitimate consequences, which he failed to do. As Schiller says, "Kant did not grasp all that is contained in *ours*—the real nature of our knowing not as a mechanical

¹ *Pragmatism*, p. 249.

² *Prolegomena*, p. 61.

operation of pure intellect, but as a function motivated by our needs, ends. He did not see that fundamental axioms (like causation) which he regarded as facts of mental structure originate in subjective demands."¹ But, allowing for this limitation already discussed, it is with the doctrine of a constructed experience just the same that Kant and we are here concerned. Kant sees that nature does not prescribe laws to our understanding, for in that case we should have only empirical knowledge. He means by this that we should have only accidents, fragments, dead copies. For an a priori knowledge of nature our understanding must prescribe laws to nature. This means, to make use of trite allusions, that he cannot rest satisfied with the conception of the mind as an empty casket or a blank tablet whose sole function can be to take in or register what falls into or strikes it from an external source. That was just where Locke and Hume left the matter. Mill expressed the same reaction when he later asked, How can a series of impressions know itself as a series? Kant says: "The understanding creates its laws not from nature, but prescribes them to it."² Here again is the cardinal error of separating two aspects of the knowing process, instead of treating that process as just one whole fact. But the problem had been transmitted to Kant in this form and our interest is in the hints given of the functional use of the categories. It is only to nature as phenomena or as a group of phenomena that the mind thus prescribes its laws. Our understanding cannot determine nature as a thing-in-itself or as a system of things-in-themselves. "The cognition of what cannot be an object of experience would be hyperphysical, and concerning that the subject of our present discussion has nothing to say, but only concerning the cognition of nature, the reality of which can be confirmed by experience. Our inquiry here extends not to things-in-themselves, but to things as objects of possible experience, and the complex of these is what we properly designate as nature."³ We are, therefore, justified in holding that the distinction between phenomena and noumena, while it constitutes an obstacle to a thoroughly consistent pragmatic attitude, and shows Kant's rationalistic predilections, is not logically germane to the problem he is here discussing.

The tedious repetitions of Kant's own work are likely to encumber our comparative study, but it seems necessary to say that it would be idle to deny the error of Kant and his followers of the Hegelian school in disregarding the psychological aspects of the categories and in seeking to

¹ *Studies in Humanism*, p. 468.

² *Prolegomena*, p. 36.

³ *Ibid.*, p. 51.

remain on the inner side of cognitive processes for a special theory of knowledge. The separation of stuff and form smacks of the outworn theory of separate soul-capacities, as well as of sensation-atomism. Pragmatists have rightly asked in what sense the categories are a priori—whether in a logical or psychological sense. Schiller has suggested that the Kantian categories as well as the forms of perception could show their *exclusive* validity only if the truth of his table of categories itself shows an a priori necessity of thought. If empirically they are verified before all others, they may be allowed to stand. But all subsequent research has shown just the opposite. It is far from our purpose to defend his table of categories or the artificial system of them and that is not the point. Pragmatism constructs the categories as well as the forms of space and time as psychological facts, that is, as facts that do not contain a solution of the problems of knowledge, but are themselves the proper objects of psychological investigation. It recognizes the validity of no one table of categories alone. Their number and nature must depend upon our experience. They grow out from human personality and its needs as their starting-point, with the possibility of further future development. But it is doubtful if certain pragmatists, in their consideration of the categories, have done full justice to Kant's meaning, have seen his essential kinship with them in placing himself upon the phenomenalist standpoint. Kant holds that if nature were a connection of real things, we could arrive at a knowledge of the laws of this connection in two ways only; either because we should find these connections in experience or because, while we construct them out of our own forms of synthesis, it is so *arranged* that we get a knowledge of reality itself in the process. The second alternative assumes the pre-established harmony which Kant once for all repudiates. The nature with which Kant deals is just the sum total of phenomena, a number of mental representations held together by the mind's own laws. To be sure, in the background of his thought stand the *Dinge an sich* as the ultimate cause of our sensations, but they are negligible for his purposes here. The universal laws of nature are really the laws of thought which we discover in experience only because we have constructed that experience in accordance with them. This, at any rate, approximates the statement of our constructive (and possibly our purposive) mental activity as it is given by pragmatic thinkers. As to the first alternative, it ignores a critical examination of what a *connection of real things* could be apart from their entrance into our organic life, and the difficulty is the seeming implication that these real things might be found if we knew how to go after them.

Pragmatists, in their handling of postulates, have explained away the Kantian criteria for valid a priori truth—his necessity and universality. They regard necessity as simply the expression of a need on our part. We need the postulate and must have it as a means to our ends. "If we make a demand that a certain principle shall hold, we naturally extend our demand to all cases without distinction of time past, present, and to come."¹ But is this essentially different from Kant's meaning? His universality and necessity are virtually one, for the former depends upon the latter. It is difficult to see in the "a priori necessity" of judgments or categories an import vitally distinct from the pragmatic recognition that "no experience can upset them because they are now a part of the structure of our mind." Indeed, if we may linger here just a moment, whatever difference there is in the two statements might be claimed for Kant's credit, for while "the structure of the mind" might conceivably be modified by a change of diet or climate affecting the nervous mechanism, Kant's criteria set forth the necessary conditions of experience. Experience may cease to be, but so long as we do business at all in the world of thinking we shall have to deal in such manner as to be understood. Kant presupposes an objective common test. Pragmatists have given more attention to the supposed derivation of categories in the experience of the race, but we have already indicated that Kant was not concerned with the evolutionary aspect of them. Again we concede his limitations. He does not pause to inquire enough as to the relative stability of the concepts with which thought must operate. Professor A. W. Moore has well said: "The certainty of the categories is even more fatally universal than the tides or the eclipses."² Kant says explicitly: "So there arose the pure concepts of the understanding, concerning which I could make certain that these and this exact number only constitute our whole cognition of things from pure understanding."³ In working over his concepts according to the Aristotelian tradition he took his resultant table much too seriously. His reality is not fluid and plastic enough for the pragmatist, but his conception of the relation of thinking to truth and reality leans directly toward pragmatism. While he held the conception of deductive certainty as the ideal of science and was still burdened with the view of final, unmodifiable knowledge, yet we may recognize the value

¹ Schiller, *Personal Idealism*, "Axioms as Postulates," p. 69.

² *Pragmatism and Its Critics*, p. 73.

³ *Prolegomena*, p. 85.

of his position for scientific procedure for all time. In the language of DeLaguna:

We are in possession of a number of very general principles, to which we attribute a truth that is not conceived as open to correction by any experience, inasmuch as all the particulars of experience are interpreted in accordance with these principles, and any observation which apparently contradicted them would rather itself be denied than cause a modification in these principles. These principles are obviously synthetic, and thus open to formal questioning, and no demonstration of their truth can be given; but they constitute the most comprehensive organization of our experience, and it is in this function that their validity consists. The reality of phenomena in our experience has no further assignable meaning than their conformity to these most general conditions of experience.¹

Schiller gives the statement: "The a priori axioms are facts—real, solid, observable, mental facts—and woe betide the philosopher who collides with them. In one word they are *psychical* facts of the most indubitable kind."² Such expressions are hardly a forced paraphrase of Kant's statement, if we are looking for his real meaning. There is every reason to believe that he would have welcomed Darwin's discoveries and all the adjustments of thinking that flow from them, for no thinker was more hospitable than Kant to every desirable advance in scientific procedure.

It is exceedingly difficult, from our modern standpoint, in considering the categories, to eliminate the genetic and even the chronological aspects of their development and keep the attention focused on their purely logical nature. This is but another way of saying that the lines of sheer demarkation between psychology, logic, and epistemology have broken down. The whole problem is one that essentially involves psychology. Kant is seeking to describe what actually takes place in an act of knowing—a matter of psychological fact. Logic may then claim the task of evaluating these processes, of ascertaining whether our judgments attain the truth at which they aim. If epistemology is to have any legitimate field of its own, it must embrace these two aspects, rather than assume an attitude of indifference toward either of them. Had there been in Kant's day a body of genetic psychology and had he found as ready at hand the means to resort to its aid as do the pragmatists, the kinship between his purposes and theirs would be more easy

¹ *Dogmatism and Evolution*, p. 213.

² *Personal Idealism*, p. 79.

of establishment and the implied functional leaning of his thought would be nearer to explicit statement. He desired, as he would phrase it, to keep his *Critique* clear of all doubtful opinions regarding the descriptive and explanatory science of cognition. Can we wonder at this when we remember the unsatisfactory character of the attempts of Locke and Berkeley, when we recall particularly Hume's difficulties in reducing the self to "nothing but a bundle of different perceptions," "all probable reasoning to nothing but a species of sensation," and his utter failure to account for what knowledge we do possess? It was the faulty psychology of his predecessors that alienated Kant from the psychological standpoint. But he failed to see that his own epistemology involved those same faults on the other side. Hume left experience, to borrow a homely metaphor, as a tableful of detached pieces of cloth. Kant put them together with exaggerated emphasis upon the seams. Neither of them grasped the truth that experience is just one seamless garment, one whole within which the distinctions are set up between subject and object, between mind and the quality which it perceives. Hume's limitation was not, as Kant supposed, in the excess of his psychology but in the superficiality of his psychology. Kant's effort to divorce the theory of knowledge from a critical opinion upon questions in the psychology of knowledge was not only impossible but incompatible with his original purpose. To apply the critical method to his naïve assumptions is only to follow him in the spirit, if it does seem to contradict him in the letter.

Pragmatists would say that human knowledge from the beginning must have developed just in the way we now see it going forward; or rather, being obligated to deal only with knowledge as we now possess it, they would imply that, so far as reference is made to the past, it must obviously be in accordance with our present method of knowing. Fundamentally this is quite in harmony with Kant's *Critique*. It was precisely his theme that if we think at all we must think in a certain way, according to certain conditions. This is the gist of his whole deduction of the categories. It has long been a truth trite to the student of Kant that by a priori he did not mean chronologically a priori. Yet this fact is forgotten by some of his critics. James and Schiller have stressed the view that the method of growth in human knowledge from the earliest stages of mental life, from the first given stuff of immediate and unanalyzed consciousness—if one may speak tentatively of "given stuff"—to an ordered world of thought and conduct, has been the adoption of postulates. Such postulates on their primitive level were

scarcely more than the tentative proving of new general perceptions, as compared with the conceptual hypothesizing of present-day science. James gathers the matter up in these effective words:

There is probably not a common-sense tradition, of all those that we now live by, that was not in the first instance a genuine discovery, an inductive generalization like those more recent ones of the atom, of inertia, of reflex action, or of fitness to survive. The notions of one time and one space as single continuous receptacles; the distinction between thoughts and things, matter and mind; between permanent subjects and changing attributes; the conception of classes with sub-classes within them; the separation of fortuitous from regularly caused connections; surely all these were once definite conquests made at historic dates by our ancestors in their attempts to get the chaos of their crude individual experiences into a more shareable and manageable shape. They proved of such sovereign use as *Denkmittel* that they are now a part of the very structure of our mind. We cannot play fast and loose with them. No experience can upset them. On the contrary, they apprehend every experience and assign it to its place.¹

The categories of Kant stand on the same level with perceptions of so-called common-sense, with thing, body, attribute, spirit. They were set up as principles for the comprehension and organization of the immediately given material of life, even before the conception of a postulate or a hypothesis was abstractly or consciously formulated. Every new vindication which a hypothesis found in experience brought it nearer the range of certain truth. Every new verification helped to harden the original beliefs into knowledge. These general perceptions and categories have now served their purpose for untold generations, assisting in the establishment of an ordered reality. Small wonder that they should finally come to be regarded as possessions of pure reason, independently of all experience. In reality the difference between these most certain truths and the most daring hypotheses is merely one of degree. They differ not in the manner of their arising, but by their age, by the extent of their influence and verification, in short, by their *working*. Kant's categories like all others are a collection of successful postulates. They have been verified from age to age until our whole speech now rests upon them and we could hardly think naturally in any other expressions.

Accepting this account as substantially correct, we believe that it is not far removed from Kant's own meaning. In his "Ideas of Reason" Kant hints at all this through his mechanical and technical terminology and even in the "Analytic" itself we come upon plain suggestions of the

¹ *The Meaning of Truth*, p. 62.

functional character of all the categories. We have said that he would have profited by a genetic investigation of the relation of thinking to other modes of experience and by an inquiry into the *specific conditions* under which thought-processes arise. Specific conditions he disclaimed any treatment of except to say emphatically that definite, specific laws cannot be determined by pure reason. His persistence in keeping to the *general conditions* has aroused in some minds the suspicion that the organic and functional character of thinking was wholly unappreciated by him. It is, however, neither necessary nor just to regard his epistemology as an outworn relic of rationalism. It has a forward as well as a backward look and value.

To summarize, then, Kant's doctrine of nature, before proceeding to a more minute study of the worth of his categories, we have found him approximating a distinctively dynamic explanation of our actual world and life. The mind, with its forms and categories, working with concrete material, constructs its phenomenal world governed by its own laws. It does not find an external world of nature to be merely copied or represented by its ideas—thus he disposes of realism. Nor does it, on the other hand, create and evolve the world of nature out of its own pure activity—this should have forewarned and prevented the systems of pantheistic idealism that offered themselves as the completion of his thought. It supplies the forms only, co-operating with an element from ultimate things. The latter is a residual element involving an assumption from which he was unable to escape. His approach to pragmatic attitudes appears in the fact that mind does furnish these constituent factors, that it functions in the upbuilding and systematic ordering of the only world of nature which it knows or with which it has anything to do. Mind and nature develop from within experience itself.

THE SCHEMATISM OF THE CATEGORIES

We wish to inquire first if, in the "Schematism of the Categories," it does not appear that these connecting principles of Kant, to have any real significance, are really functional, limited to their cash value in arranging, correcting, reorganizing concrete experience.

The very fact that Kant finds it necessary to ask, "How can the categories be applied to phenomena?" and to find "some third thing homogeneous on the one side with the category and on the other side with the phenomenon, that renders the application of the former to the latter possible," shows that they must be taken functionally to make sense. He explicitly says that the purpose of the schema is to confine the concept to its "restricted application." "For concepts are quite impossible and cannot have any meaning unless there be an object given either to them, or at least to some of the elements of which they consist, and they can never refer to things-in-themselves."¹ He continues: "These schemata therefore of the understanding are the true and only conditions by which these concepts can gain a relation to objects, that is a *significance*."² In the second edition, especially, Kant added some significant words regarding special laws that bear upon our comparative study, as indicating the reduction of the transcendental to the functional. He added: "The pure faculty of the understanding is not competent by means of mere categories to prescribe any a priori laws to phenomena, except those which form the foundation of nature in general, as a uniform system of phenomena in space and time. Special laws, inasmuch as they relate to empirically determined phenomena, cannot be fully deduced from pure laws, although they all stand in a body under them."³ Empirical laws, then, are not derived from pure understanding. Empirically given facts or objects are required for the application of these principles. The real value of the categories is limited to their scientific employment.

"The schema of the triangle is simply a rule for the synthesis of the imagination, in the determination of pure figures in space." That is to say, "triangle" is merely a way the mind takes of constructing its experience that will be dependable for all phenomena requiring treatment in a certain way. What kind of synthesis can it be if not functional?

¹ Mueller's trans., p. 114.

² *Ibid.*, p. 119.

³ Mahaffy's trans., p. 26, end (2d ed.).

We should have mere verbiage. The same statement might be made of the concept of a tree or of any other object. "The concept of dog means a rule according to which my imagination can always draw a general outline of a four-footed animal, without being restricted to any particular figure supplied by experience."¹ This simply means that general ideas or concepts are as necessary for rational experience as are the images of particular ideas. They do not exist off in a world by themselves. Kant is particularly careful here to show that categories are for use in response to the highest intellectual need of our lives, namely, unity. He says: "The schema of a pure concept is nothing but the pure synthesis determined by a rule of unity. It amounts to nothing else but to the unity of the manifold and therefore indirectly to the unity of apperception, as an *active function* corresponding to the internal sense."² "The categories are thus in the end of no other but a possible empirical use."³

He proceeds: "The schema of substance is the permanence of the real in time—persisting while all else changes." As we should say, it is a means of determining what we can find, what will stay put, what can be depended on in a changing order or series. Its application involves empirical objects and empirical change. When Kant undertakes in another place the scientific treatment of matter or substance, he regards it, as did Leibnitz, not as something dead, inert, but as energy, force; he shows that it is a *something* which affects our senses. But, as our senses can be affected only by motion, immediately we come to the functional determination of matter as motion. Substance or matter is that which is movable in space—*das Bewegliche in Raume*.⁴ This may be taken not unfairly as illustrative of what Kant means in his schematism of the concept.

Cause is a way of getting regularity of succession under conditions of time. It is a conception to be used of the particular objects of experience in relation to each other, but perfectly meaningless if applied to experience as a whole. The postulate that every event must have its cause verifies itself, as the pragmatist would say, in its successful application as an instrument for controlling the world of experience. It serves us because we wish to be in position to call forth or arrest its influence. "The concept of cause implies a rule, according to which one state follows another necessarily." Kant immediately adds its hypothetical character in the admission, "but *experience* can only show us that one

¹ Mueller's trans., p. 116.

² *Ibid.*, p. 119.

³ *Ibid.*

⁴ *Metaphysische Anfangsgründe der Naturwissenschaft*, p. 320.

state of things often, or at most, commonly follows another, and therefore affords neither strict universality nor necessity."¹

In his treatment of cause Kant undoubtedly took himself too seriously in holding that he had added materially to Hume's account. What he has added, and what brings out clearly the implied pragmatic character of all his categories, is that cause *must be hypothecated* to render experience orderly, satisfactory—to give us a rational world. Hume's "problematical concept," as he calls it, becomes his own hypothetical concept and the only real difference is that he sees better than Hume that the hypothesis *must be held if we are to have an experience that will hold together*. It is simply a human need that changes the judgment of perception, "If the sun shines long enough upon a body it grows warm," into the judgment of experience, "The sun is by its light the cause of heat." Experience is more than a mere aggregate of perceptions. It *requires* thoroughly and necessarily valid rules. But Kant forgets at times wherein consists the test of their validity. Yet in the same place quoted from above he adds distinctly: "I do not at all comprehend the possibility of a thing generally as a cause, because the concept of cause denotes a condition not at all belonging to things, but to experience."²

Referring again to space under this special chapter, Kant hints that this form itself must be schematized and seen in its functional aspects to afford meaning. "Space is the pure image of all quantities before the external sense." In the Dialectic he again says: "Space, though it is only a principle of sensibility, yet serves originally to make all forms possible, there being only limitations of it. For that very reason, however, it is mistaken for something necessary and independent, nay, for an object a priori existing in itself. Thus a *regulative principle* has been changed into a *constitutive principle*."³ We might add, in illustration of its regulative or practical use and of the criterion of its validity, that the Euclidean conception of space and the corresponding geometry built upon the postulate of plane rather than spherical triangles has been held true and has to this day refused to be displaced by some competitive conception simply because it has satisfied human needs or, at any rate, men have thought that it did. It enabled the astronomers, for example, to calculate with approximate and satisfactory accuracy the dimensions of the farthest systems of suns and other matters of scientific interest involving its application.

¹ Mueller's trans., p. 74.

² *Prolegomena*, p. 70.

³ Mueller's trans., p. 499.

Thus all the categories when schematized appear as rules or guides to practical conduct. They have what the pragmatist would call a purely instrumental character. What other "deduction" have they? In the schematism, says Kant, thought moves under the conditions of time. When does thought ever move outside of these conditions? Kant's concepts are constitutive only when he gets out of time and "rides his high horse." When applied practically they all reduce to dependability. Watson, in his later work, gathers the matter up admirably:

Examination shows that the limitation of the categories to objects of sensible experience applies to every one of them. It is not possible to give a real definition of any category, or a single principle of the understanding, without schematizing it. The principle of substance, taken by itself, is merely the conception of that which is always subject and never predicate; but we have no possible knowledge of any actual object conforming to this definition except an object that is presented to us as that which, in contrast to its changing accidents, is permanent in time. The categories, then, in every case are limited to phenomena.¹

We shall see later that in the "Transcendental Dialectic" Kant really justifies the ideas of reason, even those which are demonstrated to have no value as purely speculative concepts, by the extension and application of this schematism. He virtually deduces them all as he deduces his main concepts—substance and causality.

Kant's things-in-themselves deserve examination in a separate chapter, but so far as the schematism of the categories is concerned the matter may be disposed of by saying with Paulsen that Kant really has two tables of categories—"a pure conceptual one, and one reduced to sensuous terms; a purely logical, and a table of real categories."² The significant fact that we are stressing is that only the table of functional categories has any validity for the world as we know it, for actual experience. Kant does unmistakably shift from one table to the other and does apply them to things-in-themselves. Yet again and again he comes back to their true practical use, and no one could state more forcefully than he the futility of any but functional categories. Under the "Discipline of Pure Reason" he summarizes the whole matter in these pragmatic words:

As we cannot form the least conception of the possibility of a dynamical connection a priori, and as the categories of the pure understanding are not

¹ *The Philosophy of Kant Explained* (later work), p. 222.

² *Immanuel Kant*, p. 184.

intended to invent any such connection, but only, when it is given in experience, to understand it, we cannot by means of these categories invent one single object as endowed with a new quality not found in experience, or base any permissible hypothesis on such a quality; otherwise we should be supplying our reason with empty chimeras, and not with concepts of things. Thus it is not permissible to invent any new and original powers as, for instance, an understanding capable of perceiving objects without the aid of the senses, or a force of attraction without any contact, a new kind of substance that should exist, for instance, in space, without being impenetrable, and consequently, also, any connection of substances different from that which is supplied by experience; no presence except in space, no duration except in time. In one word, our reason can only use the conditions of possible experience as the conditions of the possibility of things; it cannot invent them independently, because such concepts, although not self-contradictory, would always be without an object.³

Pragmatism would correct this statement only in the direction of recognizing unambiguously the dynamic use of concepts. It is evident that by a *dynamical connection* a priori Kant is harboring his delusion as to possible *intelligible conditions* as contrasted with phenomenal, is still separating matter and form, not realizing that the word *dynamical* would admirably characterize just the actual work of his categories as he here describes or hints at it. Kant has felt the futility of this distinction all along in trying to bridge the gap with a third term. What he failed to see is the fact that there is no gap to be bridged, there is no such thing as possible *datum* outside of meaning, of thought; what really exists is just the whole experience. From the phenomenal side, however, his statement makes crystal clear the use of his concepts within the process of getting knowledge or experience as we have it, and that by no possibility can they be stretched to apply to outside objects.

In Kant's constant mania for schematizing, therefore, in the immediate necessity which he feels to *apply* his categories, to find a bond of connection between them and phenomena, we have a virtual recognition of the meaningless character of purely logical categories. As Paulsen says, "All kinds of devices and padding were invented to fill out the vacant places of the a priori scheme."⁴ His schematism practically means the reduction of his categories to terms of sense. It is instructive, for our purposes, to notice how he is forced over into the actual functional work and worth of our mental concepts even when his object is to remain on the inner side of mental life. The schematism is supposed by

³ Mueller's trans., p. 618.

⁴ *Immanuel Kant*, p. 71.

him to be "an art hidden away in the depths of the human soul, the secret of which we need not hope to drag forth to the light of day."¹ It is introduced at first to show how a factor of "pure a priori imagination" unites with an empirical factor in the application of our understanding to phenomena. In the actual outcome, however, this "hidden art" becomes a way of filling up empty concepts with real meaning. The various schemata are virtually "belated definitions" of logical forms when they are no longer *pure* but really instrumental for experience, when they have some real work to do. In all of this Kant treats his transcendental elements not as antecedent to, contrasted with, or actually separable from, the functional, but merely as subphases or factors in the functional process itself. Any real demarkation between the two aspects fades out in their application.

¹ Watson, *Selections*, p. 87.

THE REGULATIVE USE OF REASON—THE ANTINOMIES

In Kant's treatment of the regulative use of the ideas of reason and in the section of the "Transcendental Dialectic" leading up to these we come into close relations with the pragmatic doctrine of the notion of truth and the nature of truth.

From the very beginning of the pragmatic movement the similarity of Kant's postulates of the practical reason for moral and religious ends to certain features of the pragmatic attitude has been noted, but it has not always been observed that in the "Dialectic" of the *Critique of Pure Reason* itself Kant gives a relatively exhaustive consideration to the postulates or hypotheses of pure reason for *scientific* purposes, and further that he treats the ideas of reason with a full appreciation of their teleological bearings, or, as the pragmatist would phrase it, with a realization of the purposive character of all human thinking.

We may not, of course, in strict accord with pragmatic ways of thought and expression, recognize any clear distinction between theoretical and practical reason; yet Kant's frequent resort to these antithetic terms makes it difficult to discuss his system without them. We are reminded, too, in this pragmatic comparison, of Professor Lovejoy's contention that there are thirteen different types of pragmatism; yet, as it is true that psychologists of all shades are agreed as to the main topics to be treated by that science, just so may we indulge the hope that pragmatic thinkers, fairly understood, are not seriously at variance as to their main tenets.

Pragmatism has no trouble with the right of practical reason in holding as true that which verifies itself in practical consequences; that which aids in the construction of a world-whole in which our feeling and active being are harmonized; or if not a world-whole, specific wholes to meet specific problems, for pragmatism is not as much concerned with the problem of a world-whole as are idealistic schemes of thought. The theoretical reason also might be conceded the right to hold as true that which enables the intellect to govern its ordered world. James says: "Ideas become true just in so far as they help us to get into satisfactory relations with other parts of experience, to summarize them and get about among them by conceptual short cuts instead of following the interminable succession of particular phenomena."² If we accept the

² *Pragmatism*, p. 58.

definition of truth which makes it that which works in its practical consequences, the theoretical and practical reason would seem to reduce to the same footing, and this is virtually the outcome of Kant's treatment of his "Ideas of Reason."

The critics of pragmatism have thought that there is a profound difference between the two. Practical reason, they would say, may claim the right, in questions that cannot be settled on intellectual grounds, to assist in bringing about a solution by practical belief, hypothesis. But the case is different when we are dealing with objective facts or realities the truth of which does not depend on our attitude of faith. Here we move upon purely intellectual grounds, in the realm of the theoretical reason. Here the intellect ignores the interests of free will and the field is closed to voluntary hypotheses. This statement would probably stand from the viewpoint of either the realist or the idealist.

Now it should be noted in passing that James nowhere maintains that *any* sort of satisfactoriness suffices to establish the truth of a proposition, and that in this connection he is dealing with cases where all theoretic signs fail and where the will-to-believe is invoked as an unavoidable substitute. He definitely expresses himself to this effect in a letter to a German contemporary¹ as well as in other places. But James and other pragmatists do contend that the intellect—even theoretical intellect—is made up of practical interests, and therefore that the word theoretical in this sharp sense is a misnomer. This is practically what is meant by the "instrumental" view of truth taught by Dewey and Moore at Chicago and promulgated by Schiller from Oxford. James says:

It is far too little recognized how entirely the intellect is built up of practical interests. The theory of evolution is beginning to do good service in its reduction of all mentality to the type of reflex action. Cognition, in this view, is but a fleeting moment, a cross-section at a certain point, of what in its totality is a motor phenomenon. In the lower forms of life no one will pretend that cognition is anything more than a guide to appropriate action. The germinal question concerning things brought for the first time before consciousness is not the theoretical, "What is that?" but the practical, "Who goes there?" or rather, as Horwicz has admirably put it, "What is to be done—*Was fang ich an?*" In all our discussions about the intelligence of lower animals, the only test we use is that of their *acting*, as if for a purpose. Cognition, in short, is incomplete until discharged in act."²

Many of the grotesque interpretations or misinterpretations of the pragmatic definition of truth would have been spared us if its critics had

¹ *Kant Studien*, XIV, 24.

² *Will-to-Believe*, p. 85.

grasped fully the fact that pragmatism does not designate as true whatever is useful to our practical interests in the daily sense of the word. Says James again:

The unwillingness of some of our critics to read any but the silliest of possible meanings into our statements is as discreditable to their imaginations as anything I know in recent philosophical history. Schiller says the true is that which works. Thereupon he is treated as one who limits verification to the lowest material utilities. Dewey says truth is that which gives *satisfaction*. He is treated as one who believes in calling anything true which, if it were true, would be pleasant.³

Pragmatic doctrine is that the worth of a scientific hypothesis consists in most, if not in all cases, in its usefulness in striving for an ever-greater simplification and unity of our world of experience in all of its aspects, or where that unity has been destroyed by new complications and differentiations, to overcome the destructive conflict and proceed by a better method of organization and control. Now with this let us compare Kant's explicit declaration that "all interest is at last practical and what the speculative reason itself postulates is completed only in practical use."⁴ The atomic theory, to resume a former illustration, long cherished as indubitable scientific truth, was true in so far as it offered a workable basis for simplifying and understanding a mass of facts. Now that we have more facts, or facts of a different kind, we need a modification of that theory to restore satisfaction. In Dewey's decisive words, "In every scientific inquiry there has been relegation of accepted meanings to the limbo of mere ideas; there has been a passage of some of the accepted facts to the region of mere hypothesis and opinion. Conversely there has been a continued issuing of ideas from the region of hypotheses and theories into that of facts, of accepted and meaningful contents."⁵ Now, the faithful expositor of Kant may contend that, while this is good rebuttal for the realist or the idealist, as correcting static inclinations, it does not touch Kant's fundamental positions. Any suggested need of evolution in his principles is from the mark, for modern discoveries in biological and physical science—radium, electrons, or what not—in no wise discredit or weaken the laws of experience as he laid them down. He was careful to say that only the *general* conditions of experience are to be regarded as *a priori*. The uncompromising Kantianer may hold that Kant was merely dealing

³ *Pragmatism*, p. 234.

⁴ *Critique of Practical Reason*, Dialectic, II, 3 am Ende (Mahaffy).

⁵ *Studies in Logical Theory*, p. 12.

with the common necessity of connecting experience by cause and effect, of making a necessary distinction between substance and states so that we may think of something as changing without being involved in utter discontinuity; that whatever be the more particular problems with which he made no pretense of dealing, the same quality of necessity attaches to his general principles today as was clearly seen by him to belong to them at that time. If this contention be true, Kant is even more consistent with modern pragmatism than we had hoped to show. We have conceded the great value of these general principles, but it would seem, from the functional standpoint, that he was too much hemmed in by a mechanical conception of the world in entertaining the belief that for scientific unity and coherence certain concepts could be specified once for all, with no possibility of future questioning. As Paulsen has suggested, it is not quite inconceivable that there might be a future metamorphosis of the forms of perception and thought. Kant was, however, essentially correct in affirming that the demand for unity and continuity lies at the base of all the forms and ideas by which we aim to understand nature and the world. We believe that his whole statement of the regulative ideas of reason accords with the functional conception of the nature of truth in the domain of scientific thought and investigation as well as for moral and religious ends.

Here again it is significant that in his contrast of constitutive and regulative principles of reason the only principles dogmatically assumed as constitutive are the mathematical. His effort is to conceive of others after the analogy of these, never suspecting that mathematics is as empirical as biology. Now it is true that in mathematics we do proceed to a greater extent upon our own hypotheses than in biology, yet, as we have seen, geometry implies space, and space implies an arrangement of sense-perceptions. Once over this difficulty, however, Kant, in his treatment of the antinomies, reveals the instrumental character of the principles of reason. The whole difficulty is shown to arise from the attempt to apply concepts that are limited to experience, to a world of ultimate things—to hypostasize them. At this point again the gap exists between him and the pragmatist, the latter having no ultimate objects standing off there in a region by themselves. We do not seek to make Kant more modern or self-consistent than he is. These are due to his retention of assumptions. Yet, for logical purposes, these ultimate things are not an essential feature and they do not prevent him from elucidating the functional nature of his principles of reason: "Now it has been clearly enough shown that the principle of reason is not a con-

stitutive principle of objects in themselves but is merely a rule for the continuation and extension of a possible experience. If we keep this steadily before our eyes, the conflict of reason with itself is at an end."¹ Again, "Everything in the world of sense has an empirically conditioned existence and no property of a sensible object has unconditioned necessity."² He shows that a metaphysic of that which cannot be experienced is impossible. In his discussion of the antinomies he indicates that the old mistake of Zeno's puzzles is repeated—the mistake of taking concepts in two different connotations. But he fails to see, after all, that he repeats the same old error himself in admitting by implication "objects beyond experience." He does not realize the uselessness of not limiting reality to the first and proper use of the categories.

With tedious detail and reduplication he shows that the cosmological ideas are fruitlessly making their dialectical play because "they do not even admit of any adequate object being supplied to them in any possible experience, not even of reason treating them in accordance with the general laws of experience."³ "Nevertheless," he says, "these ideas are not arbitrary fictions, but reason in the continuous progress of empirical synthesis is necessarily led on to them."⁴ That is to say, even ideas that are not scientifically valid are adopted or develop precisely out of certain inevitable problems. What then constitutes the difference between them and ideas that are valid? Just the fact that they lack objects or experiences to verify them. Other ideas of reason, he proceeds to show, do have a certain verification.

Kant is concerned in this section as throughout his system that empiricism itself shall not become dogmatic, any more than rationalism, and assume to "boldly deny what goes beyond the sphere of its intuitive knowledge."⁵ We are not to be deprived of our "intellectual *presumptions* or of our *faith* in their influence upon our practical interests."⁶ How similar this is in sound to the *will-to-believe*. Such intellectual presumptions and faith must not, however, take "the pompous titles of science and rational insight, because true speculative *knowledge* can never have any other object but experience."⁷ Could anything more be needed to show that Kant realized the practical and purposive character of mental activity? He removes knowledge (false knowledge) to save belief (belief that has significance for practical ends). Why does Kant

¹ Watson, *Selections*, p. 173.

² *Ibid.*, p. 193.

³ Mueller's trans., p. 379.

⁴ *Ibid.*

⁵ *Ibid.*, p. 386.

⁶ *Ibid.*, p. 385.

⁷ *Ibid.*

so laboriously examine these "transcendental problems of pure reason" and why is it absolutely necessary that we find their solution? Precisely in the interest of scientific and moral progress, that man may not oscillate constantly from one side to the other of opposed meanings or doctrines, but may have a definite criterion for the retention and use of these ideas. And what is that criterion as Kant here develops it? It is just the *workableness* of ideas for human satisfaction—ideas, let us observe, that are not dialectically subjected to or *subject* to contradiction by being stretched beyond their true functional application. That application is established by their critical examination and the careful elimination of all ideas that have no objects of experience, with yet a tolerant word in excuse of even invalid ideas that spring up as supposed—falsely supposed—solutions of problems.

Incidentally, in this section, Kant seems to sustain the pragmatist as over against the realist and possibly as against the absolutist. He says:

The objects of experience are therefore never given by themselves, but in our experience only, and do not exist outside it. That there may be inhabitants in the moon, though no man has ever seen them, must be admitted [living today it would be Mars]; but it means no more than that in the possible progress of our experience, we may meet with them; for everything is real that hangs together with a perception, according to the laws of empirical progress. They are therefore real if they are empirically connected with any real consciousness, although they are not therefore real by themselves; that is, apart from that progress of experience.¹

Dewey might well have used this as illustrative of his "present as absent" or "experienced as absent," of the fact that the contrast of present and absent or present and past must itself fall within experience. Where else can it fall? It is noticeable also that Kant does not explain the possible existence of moon-dwellers as *existence for the absolute consciousness*. How is it likely that he would deal with such facts as the glacial epoch? Would he not seem to agree with D. L. Murray that—we mean only that our experience is such now that it is best explained by a belief (pragmatically confirmed in every moment of our lives) that reality has had a history and that a glacial epoch occurred in that history. This painful experience therefore would presumably have been ours, had we entered into the world-process at that stage, and this whole history is so essentially knit up with the reality of our present world, that it is as real as it and as real as we.²

It cannot be ignored that Kant, in his teaching of empirical realism and transcendental idealism, does give unconsciously two totally distinct

¹ Mueller's trans., p. 402.

² "Pragmatic Realism," *Mind*, XXXIV, 385.

definitions. In places he does plainly intimate that the phenomenally real is that which *corresponds* to the matter of our sense-perceptions or to our sensations. This would give some support to realism, for that which merely corresponds to our sensations may be distinct from them and does not necessarily cease to exist when it is not sensibly perceived. But in the sixth section of the Dialectic he holds consistently that the phenomenally real *is* the matter of our sense-perceptions or simply our sensations themselves. As for distant objects or past events, they are phenomenally real because of a possible connection between them and our present experience, because they would be or could be experienced under proper conditions. This is good pragmatic doctrine as against the realist. There remain those ultimate objects, but we may reiterate that they are meaningless for the problem Kant is here discussing. They are not the objects that realism itself would recognize in this connection at any rate. Throughout this section Kant refuses to separate subject from object, datum from meaning.

Forced to classify Kant just here, we might, then, say that he is neither a realist nor an idealist. He deals with objects, reals, which are neither independent *Dinge an sich* nor yet subjective ideas. It is significant how modernly scientific is his attitude toward these *objects of possible experience*. He treats them as do the natural sciences—neither realistically nor idealistically, but just as objects dependent upon the constitution of our experience itself. He says once more:

Perception which gives to a concept its material embodiment, is the only test of actuality. But we can, nevertheless, in advance of the perception of an object, and consequently in a relatively a priori fashion, know the existence of the object in case the thing in question is connected with any of our perceptions according to the principle of the empirical synthesis of phenomena. For then the existence of the thing is linked with our percepts in a possible experience, and by virtue of our general principles we can pass from our actual perception to the thing in question by a series of possible experiences. Thus we may recognize the existence of a magnetic substance pervading all matter, by virtue of our perception of the magnetic attraction of iron, although our immediate perception of the magnetic matter is impossible for us in consequence of the constitution of our sense organs. For in consequence of the laws of sensation and of the context of our perceptions, we should come directly to observe the magnetic matter were our organs fine enough. But the form of our possible experience has no dependence on the mere coarseness of our actual sense organs. And thus, just so far as perception and its supplementation by virtue of our empirical laws together suffice, so far extends our knowledge of the existence of things. But unless we begin with actual experience, and

unless we proceed according to the laws of the empirical connection in experience, we vainly seek to guess or to investigate the existence of anything.¹

The pragmatist could ask no more forceful statement than this of his fundamental proposition that all facts, truths, existences must ultimately be experiential, using the term experience in all its organic implications; that experience itself is our datum and our only datum; that non-temporal units are a fiction; that in our effort to give a coherent account of the reality of a thing, or of the truth of a thing, we can go no farther than to state how far we can use it, what we can do with it, what it means for us; that so far as a thing is socialized we call it an object of knowledge; that the real for us is just what we find it to be. *Was fruchtbar ist, allein ist wahr.*

¹ Mahaffy, 2d ed., p. 273.

THE IDEAL OF REASON

In the section on the "Ideal of Reason" particularly the conception of postulating is handled in a manner pretty faithfully pragmatic, and the argument is not weakened by his shifting from appearance to meaningless things-in-themselves as in the discussion of the antinomies preceding. Our concern now is to see the rôle that postulates play for scientific purposes, in our everyday workaday world. The point is to see whether he does not recognize the purposive, instrumental character of our thinking. It is not merely that we can have no ideal moral world without certain postulates, but that we can have *no kind of world* without them, and that the verification of these ideas or postulates consists precisely in the fact that we must have them to make understandable and worth while the actual world in which we live. Kant practically reminds us that we have certain ideas, purposes, relations—not merely in a moral sense, but in a scientific sense. Our world of daily thought and transaction holds together because it includes these. So much is fact. He is as certain of this as he was of the existence of mathematics and physics as bodies of knowledge. Hence these ideas are justified, vindicated. This is a not unjust paraphrase and summary of the entire section.

Incidentally, again, Kant here differentiates his system from idealism, as the latter follows the tradition of Plato. He says emphatically: "Reason can give us none but pragmatic laws of free action for the attainment of the objects recommended to us by the senses, and never pure laws determined entirely a priori."¹ With this should be taken an earlier utterance to the same point: "What to us is an ideal was in Plato's language an *Idea of a Divine Mind*, an individual object present to its pure intuition, the most perfect of every kind of possible beings, and the archetype of all phenomenal objects. Without soaring so high, we have to admit that human reason contains not only ideas, but ideals also, which though they have not, like those of Plato, creative, yet have certainly *practical* power (as regulative principles) and form the basis of the possible perfection of certain acts."² Kant proceeds in endless repetition to show the futility of trying to construct reality from pure concepts in the old rationalistic way. He has demonstrated the weakness of the ontological argument, the physico-theological argument,

¹ Mueller's trans., p. 642.

² *Ibid.*, p. 460.

and of all theology based on speculative principles of reason. Some of these expressions are pertinent for other purposes, but just here their scientific application is the issue. He says: "I maintain, accordingly, that transcendental ideas ought never to be employed as constitutive. They have, however, a most admirable and indispensably necessary regulative use, in directing the understanding to a certain aim."¹ He practically says with the pragmatist that we are striving constantly for the unification of our knowledge and experience. He points out plainly the instrumental character of every common scientific concept. "We must confess that *pure earth, pure water, pure air*, are hardly to be met with. Nevertheless we require the concepts of these in order to be able to determine properly the share which belongs to every one of these natural causes in phenomena."² Natural philosophers thus make use of concepts from reason "to explain the mutual chemical workings of matter. The hypothetical use of reason, resting on ideas as problematical concepts, is thus at work constantly in science to introduce unity into the particulars of knowledge."³ Unity, that is practical workability, is the very touchstone of the truth of these rules. Kant emphasizes the impossibility of changing such scientific rules into transcendental principles of reason. They are all tentative, subject to revision. He warns us that philosophers have unconsciously forgotten to keep this distinction and "the transcendental presupposition is concealed in their principles in the cleverest way."⁴ He mentions manifoldness, variety, and unity as mere ideas for the guidance of reason in its empirical progress, "heuristic principles in the elaboration of experience."⁵ Once more these dynamical principles (and here dynamical gets its true significance in Kant's thought) are falsely contrasted with constitutive, mathematical principles, but that is not the point. The point is that certain concepts or principles may be and must be used as *scientific maxims* in our progress toward *systematical unity*. It should be emphasized, at the cost of whatever repetition, that Kant is specific as to the scientific, purposive, hypothetical nature of these ideas of reason. They are "heuristic not ostensive." They enable us to make inquiries of nature and go forward. They do not afford an answer all ready made. The latter, says Kant, would be the reverse of scientific method. To suppose that by means of these ideas we could have knowledge of real objects in the way of definite correspondence would be to dispense with the use of reason or to turn its activity in a wrong

¹ Mueller's trans., 518.

² *Ibid.*, p. 519.

³ *Ibid.*, p. 520.

⁴ *Ibid.*, p. 524.

⁵ *Ibid.*, p. 533.

direction. The dogmatist who assumes by pure a priori speculations to demonstrate the unity and immateriality of the soul, or the origin of all things in God's intelligence, is starting at the wrong end. He is turning away from pure empirical investigation, or he merely twists empirical facts to correspond with the results of his a priori reasoning. He imposes upon nature his external system of teleology and prevents himself from finding out the real nature of its unity. His argument moves in a circle, assuming the very thing it sets out to prove.

While Kant recognizes the need of certain ideas to direct and systematize experience, he breaks again with the pragmatist in regarding experience itself as inadequate for their realization or verification. Yet he practically proceeds to verify them or deduce them just as he has deduced his more certain categories. His "deduction" of these ideas illustrates the pragmatic notion of truth. Such concepts, ideas of the speculative reason, have "a schema to which no object, not even a hypothetical one, corresponds directly, but which seems only to represent to ourselves indirectly other objects through their relation to those ideas, and according to their systematic unity."¹ After all that he has said in criticism of the three transcendental ideas—the psychological, cosmological, and theological—his real deduction of them consists in showing that our experience is better arranged and improved by means of them than without them. It is significant here that he reiterates and illustrates what he has already indicated in his "Schematism of the Categories," namely, that such concepts as substance, reality, and even causation "have no meaning, unless they are used to make the empirical knowledge of an object possible. They may be used to explain the possibility of things in the world of sense, but not to explain the possibility of a *universe itself*, because such an hypothesis is outside the world and could never be an object of possible experience."² Kant is merely extending his schematism over the whole field of ideas and practically vindicating the ideas of reason on the same level with his necessary categories, namely, by their cogency in practical working. In the words of DeLaguna:

They are never realized in any experience; that is to say, no analysis of a given experience can reveal them as verified in it. Yet they are essential to thought; for it is through their use that given experience becomes organized into the larger unity of experience as a whole. Their kinship with pragmatic postulates thus appears upon their face. Kant seems to say of them what the

¹ *Ibid.*, p. 538.

² *Ibid.*, p. 544.

pragmatist would say of all conceptions—that while they are never completely satisfied by any application of them, yet they serve to bring unity to our thought and in this service if in no other find their sanction.¹

Thus Kant would use the idea of the soul not in the Cartesian sense of substance (*res*) but merely as an instrumental hypothesis. In the *Paralogisms of Pure Reason* he has clearly shown that it is by confusion of the *logical subject* with a real substrate that the false rationalistic demonstration of the soul's substantiality proceeds. The idea of the soul as an unconditioned unity is not a matter of proof or disproof. We can no more infer from the ego of which we are conscious, that is from our one and identical thought, the existence of the soul as a substance than we can infer a soul of the world from the unity of the universe. Yet thought does appear as one and identical. That is the condition of its very existence. The possibility of the corporeal world presupposes the thinking ego, the transcendental unity of apperception. All the categories, all the forms of thought, involve this as their first condition. They all have meaning and value because they are the means which produce the unity of consciousness.

Kant schematizes the soul, as it were. In his same heavy way he says it is "the concept of the empirical unity of all thought. Its object is merely to find principles of systematic unity for the explanation of the phenomena of the soul."² He is explicit in stressing the psychological character of this idea. His expressions recall the statement of a leading contemporary psychologist that, in this connection, the soul as an entity is as extinct as the dodo. Yet even in legal science today we deal with souls—with individuals. So for purposes of unity—Kant would seem to say—all the grounds of explanation must be traced to one single principle. As if to guard against misconstruction he repeats: "It is quite permissible to represent to ourselves the soul as simple, in order, according to this idea, to use the complete and necessary unity of all the faculties of the soul, but to *assume* the soul as a simple substance (which is a transcendent concept) would be a proposition not only indemonstrable but purely arbitrary and rash."³ As Windelband well expresses it, "It is an heuristic principle for investigating the interconnections of the psychical life."⁴ In disclaiming in this place any consideration of its spiritual nature, Kant intimates that such a reference would immediately, by contrast with the corporeal, lift the concept out of its relations of experience and render it meaningless. This actualistic

¹ *Op. cit.*, p. 82.

² Mueller's trans., p. 548.

³ *Ibid.*, p. 618.

⁴ *History of Phil.*, p. 549.

theory of the soul, to use Paulsen's term, is really a dynamic element in Kant's treatment. "The soul is not a mere dead substrate, not an unchanging substance like an atom, but pure energy, spontaneous energy of knowing and willing."⁵ This view was lost or obscured for a long time and its revival in the pragmatic movement is no insignificant element of contact between Kant's philosophy and the latter movement.

The second regulative idea of speculative reason, the universe, is a functional concept, as Kant uses it, for dealing with nature in general. We must have a rule for dealing with the totality of the series of phenomena. "The absolute totality of the series of these conditions determining the derivation of all their members, is an idea which, though never brought to perfection in the empirical use of reason, may yet become a rule, telling us how to proceed in the explanation of given phenomena."⁶ The universe as such an idea cannot be treated as an object of knowledge, in the Kantian sense. He has already shown in the antinomies that when the universe is treated in this abstract manner propositions mutually contradictory can be affirmed of it. It is evidently the world of human experience, not a great external fabric of reality existing in its own independence, that Kant has here in mind.

The third idea of reason—God—as a regulative or functional idea, "can always benefit reason and yet never injure it."⁷ It serves "to connect the things of the world according to teleological laws and thus to arrive at their greatest systematical unity."⁸ This reminds one of expressions of James, except for certain anthropomorphic characters in the latter's view of God which Kant could not accept. Kant says: "Reason can have no object here but its own formal rule in the extension of its empirical use, but can never aim at extension beyond *all limits* of its empirical application."⁹ The idea of God, in other words, is plainly a scientific hypothesis for empirical satisfaction. Kant would seem to say that we need the idea of God as the chemist needs his atom or the physicist his idea of force. Atom, force, and God are all speculations, but they are necessary. Like Joseph Landor, Kant would hold that the presumption is in favor of the simplest hypothesis, and he fails to get any unity in his cosmos without the God idea. He has exposed and explained away the rationalistic fallacy of the ontological proof which would establish existence from mere concepts, of the physico-theological argument which results in a mere "Architect of the World," and of the

⁵ *Immanuel Kant*, p. 393.

⁶ Mueller's trans., p. 550.

⁷ *Ibid.*, p. 554.

⁸ *Ibid.*

⁹ *Ibid.*

cosmological proof which involves a *petitio principii*, seeking the "first cause" of all that is contingent in an "absolutely necessary existence"; but, used as a functional idea this concept affords a needed motive for scientific investigation of groups of phenomena. To assume God as proven in the old sense is "to imagine the efforts of our reason as ended when we have really dispensed with its employment."¹ It would be just the reverse of true scientific method.

If I begin with a supreme ordaining Being, as the ground of all things, the unity of nature is really surrendered as being quite foreign to the nature of things, purely contingent, and not to be known from its own general laws. Thus arises a vicious circle by our presupposing what in reality ought to have been proved. But if we use the idea as a regulative principle for the systematical unity in a teleological connection according to general laws—the principle can enlarge the use of reason with reference to experience.²

We are not here concerned to add his moral proof but merely to see his justification of this idea as a practical postulate. Not only is he pragmatic in the adoption of this postulate but he finds it verified in its efficient working, precisely as the pragmatist would contend. He adds: "As much of design, therefore, as you discover in the world, according to that principle, so much of confirmation has the legitimacy of your idea received."³ In the *Canon of Pure Reason* Kant recurs to this idea in words and illustrations most significant for this comparative study. The point is slightly confused by the contrast of practical with doctrinal belief, both of which would fall legitimately under the pragmatic conception of practical. The existence of God is there assigned to the category of the doctrinal. The discussion, however, deserves, from the standpoint of this study, a careful analysis.

Before we continue the consideration of this particular hypothesis, two points should be noted in Kant's treatment in this chapter—the limitation of the notion of truth to single judgments and his stand against the conception of truth as a mere copying relation. In both of these his handling of the matter is strikingly similar to expressions and illustrations of James. Kant had spoken in the preceding chapter of the possibility of a usable idea which does not, in the ordinary sense, correspond to an object. He now affords a better, and a decidedly pragmatic, conception of what real correspondence with an object must be to make sense. Kant does say, to be sure, that "truth depends upon agreement with its object,"⁴ but by clear illustration he interprets *agreement* in a sense more nearly related to that of the pragmatist than to that of the

¹ Mueller's trans., p. 554.

² *Ibid.*, p. 556.

³ *Ibid.*, p. 561.

⁴ *Ibid.*, p. 658.

realist or the idealist. He has been showing, just as pragmatists in answer to criticisms have shown, the absurdity of holding a thing true because it satisfies some individual, subjective need or inclination. He says:

If it has its ground in the peculiar character of the subject only, it is called persuasion. If the judgment is valid for everybody, then the ground of it is objectively sufficient and the holding of it true is called conviction. . . . Truth depends on agreement with the object, and with regard to it the judgments of every understanding must agree with each other. . . . An external criterion, therefore, as to whether our holding a thing to be true be conviction or only persuasion consists in the possibility of communicating it, and finding its truth to be valid for the reason of every man.¹

We may compare this with Schiller, "To be really certain, a truth must show more than an individual value. It must acquire social recognition and change into a common property."²

The character of the agreement Kant has in mind is vitally significant. It is difficult in this whole passage to read into his meaning the terminology of Hegel, who describes the idea as running over into the object, of the notion as finding itself again in objectivity, and of an eternal system of notions built up as absolute truth. Far less can we find here the meaning of the out-and-out realist. But let us first take James's illustration of the agreement of ideas with their objects:

According to the general view a true idea must copy its reality. Like other popular views, this one follows the analogy of the usual experience. Our true ideas of sensible things do indeed copy them. Shut your eyes and think of yonder clock on the wall, and you get just such a true picture or copy of its dial. But your idea of its works (unless you are a clock-maker) is much less of a copy, yet it passes muster, for it in no way clashes with the reality. Even though it should shrink to the mere word *works*, that word still serves you truly and when you speak of the time-keeping function of the clock, or of the spring's elasticity, it is hard to see what your ideas can copy. Wherein stands the truth of our assertion that the thing there on the wall is a clock? We use it as a clock, regulating the length of our lecture by it. The verification of the assumption here means its leading to no frustration or contradiction. *Verifiability* of wheels and weights and pendulum is as good as verification. For one truth process completed there are a million in our lives that function in this state of nascency. They turn us *toward* direct verification; lead us into the *surroundings* of the objects they envisage. . . . To agree, in the widest sense, with a reality can only mean to be guided either straight up to it or into its surroundings, or to be put into such working touch with it as to handle either it or something connected with it better than if we disagreed with it.³

¹ *Ibid.*, p. 658.

² *Humanism*, p. 58.

³ *Pragmatism*, p. 213.

In accordance with this it would appear that there are only single truths. There is no absolute truth written with bold capital letters. Now Kant declares: "I cannot *maintain* anything, that is, affirm it as a judgment, necessarily valid for everybody except it work conviction."¹ If it does work conviction in its communication and be seen as valid for the reason of every man, "there is at least a presumption that the ground of the agreement of all judgments rests upon the common ground, namely, on the object with which they all agree, and thus proves the truth of the judgment."² In the pages immediately following he gives an illuminating illustration of this kind of agreement with object. Trowing, believing, knowing are treated as degrees in the process of adopting and verifying a hypothesis. Trowing is a surmise in the face of a problem. "It is to hold true with the consciousness that it is insufficient *both* subjectively and objectively."³ Believing, an attitude to which we are driven by a problem—driven for a practical solution of some kind—occurs "if the holding true is sufficient subjectively, but is held to be insufficient objectively. . . . While, if it is sufficient both subjectively and objectively, it is called knowing."⁴ Now as to the real nature of this *objective sufficiency* follows an illustration that reads like a citation from one of the pragmatists. To accomplish ends which we are obliged to propose to ourselves "certain conditions are hypothetically necessary," or, as we should say, certain hypotheses are needed. The physician called suddenly to a case of illness must do something for the patient. He does not yet know the sickness. He looks at the symptoms and judges, because he knows nothing better, that it looks like phthisis. "His belief, according to his own judgment, is contingent only, and he knows that another might form a better judgment. It is this kind of contingent belief which, nevertheless, supplies a ground for the actual employment of means to certain actions, which I call *pragmatic belief*."⁵ Here we have not only the word correctly used but the situation just as the pragmatist likes to sketch it—a problem calling for activity, necessitating a hypothesis, a belief growing out of the conditions and verifying itself—its *truth, its agreement with its object*—in its successful grappling with the conditions and solving the problem. Correspondence with object has, then, for Kant, by plain implication at least, the pragmatic significance of response to human needs, the keeping-step with our advance in knowledge and experience.

¹ Mueller's trans., p. 659.

² *Ibid.*, p. 658.

³ *Ibid.*, p. 659.

⁴ *Ibid.*

⁵ *Ibid.*, p. 661.

And now, returning to our direct application, it is precisely thus that Kant proceeds to verify the idea of God as a scientific postulate. It is the usefulness of this idea as a working hypothesis for the investigation of nature that furnishes its vindication.

The unity of design is so important a condition of the application of reason to nature that I cannot ignore it, especially as experience supplies so many examples of it. Of that unity of design, however, I know no other condition which would make it a guidance in my study of nature, but the supposition that a supreme intelligence has ordered all things according to the wisest ends. As a condition, therefore, of, it may be a contingent but not unimportant end, namely, in order to have a guidance in the investigation of nature, it is necessary to admit a wise author of the world. The result of my experience confirms the usefulness of this supposition so many times, while nothing decisive can be adduced against it, that I am really saying far too little if I call my acceptance of it a mere opinion, and it may be said, even with regard to these theoretical matters, that I firmly believe in God.¹

Even here, however, in the most obviously pragmatic portion of the *Critique of Pure Reason*, there is a difference between Kant and the pragmatist that will not down. The very contrast throughout this section of constitutive and regulative principles involves a tacit reference on one side to a region of reality that has no abiding-place in true functional thinking. Kant wearies the reader with the affirmation and the proof that this ultimate region is not for us in our knowledge and makes contradiction and confusion in our philosophy. And that fact should have expelled it at once. But it is evident that, in Kant's thought, for some intelligible character or reality there may be constitutive thought not vouchsafed to phenomenal beings.

The transcendental ideas have no constitutive, but only a regulative use; in other words their use is to direct all the operations of the understanding to one end or point of union. This point is indeed a mere idea or *focus imaginarius*, since it lies beyond the sphere of experience, and the conceptions of the understanding do not find their source in it; yet it serves to give to these conceptions the greatest possible unity combined with the most extended application.²

Now pragmatism must, to be consistent, insist that conceptual thought itself is directly related to science and human conduct. It comes to the same thing for knowledge, as Kant is concerned in his whole system to show, but pragmatism leaves no conceptual thought as it leaves no noumenal characters standing off in a separate region. Moreover, as DeLaguna has pointed out, there is too much absolutism, after

¹ *Ibid.*, p. 663.

² Meiklejohn's trans., p. 395.

all, involved in these regulative ideas of reason to satisfy the pragmatist. They seem for the most part to be as fixed, in Kant's conception, as the categories themselves. There is the same lack of evolution, of change to meet changing requirements, in them as in the table of categories. Kant expresses with no uncertain sound this lack of evolution in even his most scientific moods: "The greatest and perhaps the only advantage of all philosophy of pure reason seems therefore to be negative only; because it serves, not as an organon for the extension, but as a discipline for the limitation of its domain, and instead of discovering truth, it only claims the modest merit of preventing error."¹ Elsewhere, of course, he intimates that his purpose in "limiting the domain" of pretentious knowledge is precisely to make it a positive factor for future scientific progress—a factor that may be used with certain confidence just because of its restriction within limits. He goes a long way back to get a running start for a good jump. His *purpose* is progressive, scientific. But it remains true that throughout his tedious investigation of knowledge and in the influence which he directly transmitted to his disciples this negative character of philosophy was paramount. In this connection James is correct in holding that since Kant's time the word "philosophy" has come to stand for mental and moral speculation far more than for physical theories.

To know the actual peculiarities of the world we are born into is surely as important as to know what makes worlds anyhow abstractly possible. Yet this latter knowledge has been treated by many since Kant's time as the only knowledge worthy of being called philosophical. Common men feel the question, "What is nature like?" to be as meritorious as the Kantian question, "How is nature possible?"²

It is the extension of knowledge that is of vital concern to the pragmatist. While this charge of James must be conceded against Kantianism historically—as a methodological influence—we must reiterate that it was precisely the desire to forward sure and certain knowledge that led Kant forth at all on his memorable intellectual excursion. He was wrong only as to the method of securing certain knowledge and as to the real scope of that knowledge.

Kant seems to be fully aware of this serious limitation to his system when he turns toward the *practical use* of pure reason. Particularly when he faces the problems of the moral life does he realize the need of something more dynamic. There are, as Royce has said, many devious

¹ Mueller's trans., p. 638.

² *Some Problems of Philosophy*, pp. 14, 15.

paths in Kant. He is not always consistent. Ward's saying that the three *Critiques* must be united into one is pertinent here. Dewey has, à propos of this thought, reminded us that to give Kant's elements of thought any such worth as he himself wished to attach to them we must take them in only one of the two senses in which he uses them. They must be understood as "regulating, making experience different in a determinative sense and manner. Taken in the sense of a static, immanent, fixed endowment, and therefore making no determinate difference to any one experience as compared with another they are confusing and have led to serious misconceptions in later philosophy."¹ In getting too much necessity and universality "we mythologize reality and deprive the life of thoughtful endeavor of its ground for being."²

To summarize Kant's treatment of the regulative ideas of reason, and particularly his section on the "Ideal of Reason," we find that he adumbrates, if he does not definitely formulate, the current pragmatic conception of mental growth, of all human progress, by postulating. He is less hampered here than elsewhere by the dogmatic heritage of things-in-themselves. Before approaching specifically the significance and proof of his postulates for the moral life, even in this first *Critique*, he shows that for the theoretical reason itself, for the demands of our common life, for the interests of straightforward scientific progress, we must adopt hypotheses, and that these find their justification and validity in their actual power of introducing simplicity, harmony, continuity. This is true of the actual world in which we labor. It is true of the man in the streets, the man at his daily tasks. The soul or ego, the world and God are instrumental ideas, having their significance, and the only proof of which they are capable, in their usefulness, in their indispensable character for the unification of thought and life. They fall short of pragmatic postulates only in the fact that they seem, like all of Kant's concepts and postulates, to be fixed and final for all time and all conditions.

¹ *Influence of Darwin on Phil.*, p. 207.

² *Ibid.*

KANT'S TELEOLOGY VERSUS MECHANICAL CAUSALITY

One phase of Kant's formulation of the antinomies that affords significant comparisons with pragmatic attitudes is his statement of the problem of mechanism and teleology. He touches it rather lightly in the first *Critique* and resumes the discussion in the *Critique of Judgment*. In both cases he hints at its proper solution by the substitution of a *both and* consideration for an *either or*. He comes upon the problem in his transition from the transcendental mathematical ideas to the transcendental dynamical. His *both and* assumes the very burdens which the pragmatist would wish to avoid, but its significance is in indicating Kant's dissatisfaction with a closed system that leaves little or nothing to purposive human activity. Moreover it bears superficial resemblances to similar discussions in pragmatic literature. Kant seeks refuge in the admission of an intelligible cause as well as a phenomenal, in intellectual perception as well as sensuous. Logically carried out, this would involve all the old dualism and has no proper place in pragmatic thinking. Kant really has two worlds, while pragmatism would limit the solution of this and of all problems to one and the same order. Shall all nature phenomena be mechanically explained or do certain products require a teleological explanation? Kant says there would be a contradiction if we should use both maxims as constitutive principles, that is, if we should hold that the production of material things is possible only on the laws of mechanical necessity, yet at the same time that some material things can be produced only on the causal law of ultimate objects. But, he thinks, there is no contradiction if we agree to regard all phenomena as coming under the principle of mechanism assumed as the basis of scientific investigation, yet still retain the principle of ultimate objects as a guide to reflection, because the organism of the part can be explained only by a consideration of the aim of the whole.

This might seem to be in harmony with pragmatic teaching regarding the conflict of postulates. Pragmatism holds that postulates are just methodological maxims of our *Welt-Betrachtung*. Natural science for its purposes demands that mechanical causality be carried out purely. So Kant says: "The intelligible has been shown to be useless for the explanation of phenomena."¹ Schiller admits a conflict here and fails to solve it further than to suggest, almost in Kant's own language, that

¹ Mueller's trans., p. 454.

we may assume the teleological treatment for a general principle of reflection upon the whole of nature and subsume mechanism as a scientific method under it. After showing that teleology is an indispensable postulate in human thinking because the conformity between nature and human nature is the only key to the arcana of life which we possess, Schiller adds:

The ideal of scientific explanation is mechanical, and this is taken to be anti-teleological. So far, therefore, teleology remains a postulate which it is not possible to carry through and to render an axiom of biological or physical research. For in the first place the anti-teleological bias of natural science is largely due to the perverse use professing teleologists have made of their postulate. Instead of treating it as a method whereby to understand the complex relations of reality, they have made it into an *argos logos* which shut off all further possibilities of investigation, by ascribing everything to a "divine purpose" and then in order to shirk the laborious task of tracing the divine intelligence in the world, adding the suicidal "rider" that the divine purpose was inscrutable.²

James holds that teleology and mechanism do not necessarily contradict each other. To say that they do would be equivalent to saying, "My shoes are evidently designed to fit my feet, hence it is impossible that they should have been produced by machinery." Now Kant is entirely in accord with these thinkers as to the non-interference of the teleological with the course of scientific investigation, with such uniformities and regularities as it is possible for us to discover. He says:

This regulative principle, however, does not exclude the admission of an intelligible cause not comprehended in the series, when we come to the pure use of reason (with reference to ends or aims). For in this case, an intelligible cause only means the transcendental and, to us, unknown ground of the possibility of the sensuous series in general, and the existence of this, independent of all conditions of the sensuous series, and in reference to it unconditionally necessary, is by no means opposed to the unlimited contingency of the former, nor to the never-ending regressus in the series of empirical conditions.³ Evidently Kant would not impede the course of scientific progress with an *argos logos*.

If Kant and the pragmatist, then, both hold to the teleological as a general principle of reflection upon the course of nature, without interfering with mechanical necessity in the domain of scientific research, what is the difference between them? Just the difference between the static and the dynamic, so the pragmatist would answer. For the

² *Personal Idealism*, "Axioms as Postulates," p. 119.

³ Mueller's trans., p. 456.

latter mechanical causality itself, with all other categories, has its genesis in the purposive and teleological activity of human thinking. It is penetrated through and through with end-striving. There is therefore no sharp difference between the two maxims or postulates. Nature, so far as we have proved it, is sufficiently adapted to our thoughts and wishes and sufficiently anthropomorphic to be mechanized. Because it is mechanical it "works into our hands." But Kant holds that there is only an accidental fitness of relation between our categories and experience from external sources. For a Godlike intellect, an intuitive understanding, to whom form and content alike were properly *a priori*, this conformity would be not accidental but necessary.

That intelligible cause, therefore, with its causality, is outside the series, though its *effects* are to be found in the series of empirical conditions. In its intelligible character, however, the same subject would have to be considered free from all influence of sensibility, and from all determination through phenomena; and as in it, so far as it is a noumenon, nothing happens, and no change which requires dynamical determination of time, and therefore no connection with phenomena as causes, can exist, that active being would so far be quite independent and free in its acts from all natural necessity which can exist in the world of sense only.¹

The *mundus intelligibilis* makes a gap once more between him and the functional attitude. In order to have design in his otherwise necessitated world he must have practically another set of categories than those which suffice for the mechanical order. But this would put all the design over into the intelligible world, and Kant fails to realize that there would be no room left for teleology in the order in which we have our human thinking and work to do. As Bergson puts it, "there would be nothing unforeseen, no invention or creation in the universe."² We should be merely working out a program already prepared and completed. Indeed, logically and consistently carried out, this would seem to commit even the intelligible order or God himself to a plan long since completed and closed. The noumenal order itself would be "the same yesterday, today, and forever." The more serious consequences, however, would seem to fall to us in the limitations placed upon our order, in the consequent loss of our social responsibility—the highest dignity and inspiration that pertain to human beings. This is a cardinal error of all absolutism and comes to much more than the pragmatic conflict of postulates.

¹ Mueller's trans., p. 438.

² *Creative Evolution*, p. 37.

The problem carried over into the field of ethics as that of determinism and indeterminism offers the same comparisons and the same crux of difference. Kant again formulates the question in the manner of antinomies. Pragmatism also treats the matter as a conflict of postulates. In both cases a *both and* is substituted for an *either or* consideration. Kant seeks a solution in adding to the causal necessity of the phenomenal world the freedom of intelligible characters. Pragmatism seeks the solution in one world or one order and finds it by giving to our thought and life wider scope. Kant may be called pragmatic in his recognition of the dilemma in which his closed system leaves him and in artificially blazing a path out at all costs. His necessity must be harmonized with freedom if morality is to be saved. He parts from the pragmatist in having resort to his assumed noumenal order:

Our problem was whether freedom is contradictory to natural causality in one and the same action; this we have sufficiently answered by showing that freedom may have relation to a very different kind of conditions from those of nature, so that the law of the latter does not affect the former, and both may exist independent of, and undisturbed by, each other.¹

Schiller thinks the problem is not insoluble if we avoid "carrying the assumption out of the realm of methodology into that of metaphysics." But this helps us very little, for to leave a gap yawning between metaphysics and other fields of mental activity is precisely what pragmatism protests against and is inconsistent with its whole theory of reality. James thinks the whole bogey can be downed if we rid ourselves of the absolutist conception of a "block-universe" and our antipathy to the idea of chance. In his notable illustration of alternative paths leading from the university to his home he declares: "What a hollow outcry is this against a chance which, if it were present to us, we could by no character whatever distinguish from a rational necessity."² There is no such thing as

absolute accident, something irrelevant to the rest of the world. What divides us into possibility men and anti-possibility men is different faiths or postulates of rationality. To this man the world seems more rational with possibilities excluded, and talk as we will about having to yield to evidence, what makes us monists or pluralists, determinists or indeterminists, is at bottom always some sentiment like this.³

James concedes too much, however, in resting the matter wholly on sentiment. We do not minimize sentiment but just here we are asking

¹ *Ibid.*, p. 451.

² *Will-to-Believe*, p. 157.

³ *Ibid.*, p. 153.

what attitude toward reality will keep sentiment within the bounds of rationality. Pragmatists prefer a world that affords possibilities, purposes, decisions which help to make changes, to alter reality in the direction in which we want to go, because no other kind of world gives moral tone and dignity. The conception of a "block-universe" is intolerable because it seems unreasonable. Temporal being is not merely the appearance of an Eternal Reality immutable and timeless. Being, change, activity are realities in the fullest sense. Bergson has suggested that any sort of finalism which assumes that all is given becomes after all only an inverted mechanism. Time and its changes lose their worth and disappear before a "mind seated at the center of things."¹ Hermann gives voice to the same thought: "In the last resort the freedom of the human agent under such an eternally conceived omnipotent governor of the universe is just as illusory as under a frankly naturalistic scheme of physical law."² For the pragmatist we as agents have something to do with changing, unifying, and ameliorating our world. This is what is involved in a pluralistic universe, although the pragmatist would concede that the world and our knowledge of it move constantly toward an ever-greater unity. We are not now concerned with the religious aspects of the problem, but evidently pragmatism has room for religious hypotheses similar to Kant's postulates of the practical reason. The difference again roots back in Kant's rationalistic background. The God of James, for instance, would seem to be a guiding and sympathizing personality working for good and not responsible for the evil in the world, certainly not indifferent to it. He is a kind of First among Peers, as indeterminate as we are. Kant's Godly *Urwesen* inhabits realms unknown to us in its being. When we seek to approach him in teleological ways we think merely of his relations to our world, not of his own spiritual characteristics. We can approach the latter only by analogy. God's understanding is intuitive while ours is discursive. "His knowledge must be perception, not thought, for thought always involves limitations."³ Kant fails to escape from the problem of the two worlds. The placing of all real determination of values in this noumenal world involved consequences which he failed to realize. In conceding to the mechanical order all human action which we can *know*, in making our phenomenal experience as utterly subject to the laws of matter and motion as is the path of a billiard ball, he virtually

¹ *Op. cit.*, p. 40.

² *Eucken and Bergson*, p. 143.

³ *Watson, Selections*, p. 37.

surrendered to the "lower categories philosophy" which he wanted to refute. His forced resort to a noumenal order to save *freedom* either from mechanical causality on one side, or from pleasure-pain motives on the moral side, was a capitulation of all realized or realizable values from which further thinking should have saved him. He does preserve these supreme values by proceeding to think and act *as if* the two worlds were one, *as if* we were not necessitated in our own world. Deeper reflection should have revealed to him that the obligation so to think and act exposes the merely tentative, human, experimental nature of "the lower categories" falsely proven to be fixed and changeless, and consequently leaves no insuperable barrier between the methods of our workaday, scientific lives and our higher interests.

It is one of the fruits of pragmatism or of the dynamic conception of reality to show the futility of endeavoring to prescribe to life *ends* completely formulated and understood in the human sense of the word. In Bergson's incisive words:

To speak of an end is to think of a pre-existing model which has only to be realized. It is to suppose that all is given, and that the future can be read in the present. It is to believe that life, in its movement and in its entirety, goes to work like our intellect, which is only a motionless and fragmentary view of life, and which naturally takes its stand outside of time. Life, on the contrary, progresses and endures in time. Of course, when once the road has been traveled, we can glance over it, mark its direction, note this in psychological terms, and speak as if there had been pursuit of an end. But, of the road which was going to be traveled, the human mind could have nothing to say, for the road has been created *pari passu* with the act of traveling over it, being nothing but the direction of this act itself. At every instant, then, evolution must admit of a psychological interpretation which is, from our point of view, the best interpretation; but this explanation has neither value nor even significance except retrospectively.¹

In ethical theory much energy has been expended in discussing whether the end of life or conduct be pleasure, happiness, or perfection, instead of having been given to the direct amelioration of life toward such standards as the actual conditions made imperative. The evolutionary hypothesis has made evident the fact that the moral life is not a set of conditions fixed for all time, but that it is constantly being determined anew by fresh conditions and combinations which themselves help to determine the ends. We do not arbitrarily construct ideals. They are made by elements at work in experience. This is the effectual answer to Locke's query as to a mathematical formulation of morals

¹ *Op. cit.*, p. 51.

What could Locke in his day know of social justice as it presses upon the English or American conscience today? Just so with our wider problem of mechanism and teleology. If reality is a changing order, no theory of final causes can be accepted that mortgages the future. The needs and conditions of the growing order itself must help reconstruct the end so far as that is capable of statement in intellectual terms. It is our same problem ever repeated of not abstracting the intellect as a self-inclosed function but of recognizing its rôle as one of the factors in the more comprehensive reality.

POSTULATES OF PRACTICAL REASON FOR THE MORAL AND RELIGIOUS LIFE

In his consideration of the *summum bonum* as determining the ultimate aim of pure reason and in his postulates of the practical reason, Kant seems to realize the uselessness of the fixed system he has elaborated, of the conception of experience "to which the speculative ideas have returned us," and turns to the practical use of reason to regain some of our lost ground and make progress in the direction of our real interests. Here, in reply to James, it appears that his deeper purpose from the beginning was intensely practical, whatever may have been the outcome in the first *Critique*. His desire evidently was, in explaining the nature of knowledge and trying to reconcile the two opposed schools of his day, to limit the pretenses of philosophy and thus clear the path for the practical postulates of conduct and religion.

In the approach to this division of the subject several points and comparisons should be clarified, if possible. We have noted the frequent and common comparison of certain positions in James's *Will-to-Believe and Other Essays* with Kant's postulates of the practical reason as having the closest relationships. Yet it is just this aspect of pragmatism itself, as treated by James, that has received the most merciless criticism and that has been repudiated by some pragmatists themselves. Dewey has seemed to criticize the rather loose treatment by James of the *satisfactions* of the practical reason on the ground that they are confused or easily capable of confusion with the strictly *scientific satisfactions* to which ideas must be restricted if they are to stand the pragmatic test of truth as synonymous with *workability*. James is believed to have dealt too generously with the whole matter of verification and verifiability in regions not open to the application of scientific tests and standards. There are, of course, various types of pragmatism, and one is by no means committed to the proposition that all of James's positions and metaphorical illustrations are sound, in the effort to point out the functional elements concealed in Kant's system. But the criticism, for our essential purposes, deserves examination as an introduction to this chapter.

The criticism offered may possibly be illustrated as follows: Truth, it is said, does not consist in a copying relation but in the workability of a concept or an idea for the satisfaction of needs or the attainment of

ends. But needs and ends are slippery terms and the satisfaction intended must be scientifically and accurately defined. To take a homely illustration, I may have an idea that a certain book much needed by me at the time of writing this paper is in an adjoining room. My belief that this particular book is there on the shelf is related to a definite problem, an intellectual need. The idea or belief is useless apart from the determinate experience which it indicates. The idea's verification will consist in my finding the book, turning to the accurate passage desired, and using it for the confirmation of my thought. This would be a case of "internal accord" and of strictly scientific verification. The idea that vaccination is the preventive of smallpox is true if it is verified in saving hundreds of people from the ravages of that disease, as attested by facts, statistics. Taking a historical illustration, Joan of Arc and others believed that she had seen white horses ridden by celestial warriors down through the ethereal spaces. The loose criterion of satisfaction as used by James might be thought to warrant the position that this belief was true, was verified in its consequences, in the satisfactory adjustments it helped to create in Joan of Arc's successful campaign for France. But, the criticism would run, a scientific test of the belief would necessitate an examination of the ground on which the horses were alleged to have stood, to the sifting of testimony, the securing of reliable witnesses, to all that is involved in Hume's classic criteria for evaluating an alleged miracle. A loose, unscientific application of this test of satisfaction-making efficacy would, it is said, open the door to the illusions and superstitions of the ages. It would be particularly facile in the hands of the Christian Scientist and the Spiritualist.

Now, before we prosecute this alleged comparison between Kant's postulates and the *Will-to-Believe*, it is important to ask whether James would seriously countenance such a loose application of his thought. It should be noted again that, in the volume referred to, he carefully narrows and defines his case. Pascal's "wager" is not recommended except in cases of forced, living options. He does not advocate a mere subjectivism, or the giving credence to "unproved and unquestioned statements for the solace and private pleasure of the believer."¹ He agrees with W. K. Clifford that this would be a desecration of belief and that "those bred in the rugged and manly school of science should feel like spewing such subjectivism out of their mouths."² He limits the case to conditions in which "our passionate nature not only lawfully may, but

¹ *The Will-to-Believe and Other Essays*, p. 8.

² *Ibid.*, p. 7.

must decide an option that cannot by its nature be decided on intellectual grounds; for to say, under such conditions, 'Do not decide, but leave the question open,' is itself a passionless decision—just like deciding yes or no—and is attended with the same risk of losing the truth."¹ The adoption of hypotheses under such conditions as these is the only device compatible with the purposive character of our thinking and conduct and is the only attitude possible for practical people who hold the optimistic attitude "that there is truth and that it is the destiny of our minds to attain it."² Such conditions and options are necessarily fast bound up with the problems of the moral and religious life.

Now this is strikingly in harmony with Kant's fundamental feeling that by means of the practical reason, which is legislative for the will, we are dealing with genuine reality, with a kingdom of ends. The similarity is intensified by the fact that with Kant also this is a region where intellectual grounds fail us, while the absolute law of our moral life forces us to some decision. (We are not, of course, discussing the question whether Kant's own beliefs are essential to a moral life.) Kant feels profoundly that reality itself must be an order in conformity with ends, with the realization of ideals. As the pragmatist would say, it must be consistent with the purposive character of all human thinking.

A closer analysis may, however, reveal that Kant is even more pragmatic and less subjectivistic in this matter than James. Our concern with the latter has been merely to give him a fair hearing. It is to be observed that for Kant's kingdom of ends the postulates of the practical reason are not optional hypotheses at all. They are postulates in the literal sense of the word—*demands* made by the moral nature. Modern men may not agree with Kant about these *needs* of the moral life. Some have expressed their disagreement. But that is another question. We are not discussing the grounds or the end of morality as a question on its own merits. Granted the moral and spiritual needs which Kant so earnestly felt, and his postulates meet the tests and verifications which the pragmatist would impose. Kant presents these needs and postulates both in his *Canon of Pure Reason* and in his *Critique of Practical Reason*. We need not burden the discussion with parallel expressions and quotations. We may note, incidentally, however, that there is some continuity between his deduction of the a priori categories of the *Critique of Pure Reason* and his justification of these postulates of the practical reason. In regard to the former he has shown that we construct our orderly experience in response to the demands of our own

¹ *Ibid.*, p. 11.

² *Ibid.*, p. 12.

nature. In the second *Critique* we learn that certain ideas, while they are not objects of demonstrative knowledge, are requisite for the needs of the moral order. It is not merely that for optional courses we may adopt these hypotheses to test their reality in the sequel. These are demands that must be made upon experience. There is nothing slippery or elusive about these needs as Kant conceives them.

Infinite progress demands, as its condition, the persistence of personality, of individuality. Nothing but personal continuity can meet the moral demands for continuity of character. Thus immortality, while not susceptible of *theoretical* proof, "depends on an a priori law of unconditioned validity. It is inseparably bound up with the moral law."¹ In the first *Critique* he had already indicated that teleological considerations required this postulate: "The proofs that may be serviceable for the world preserve their value undiminished; nay, they rather gain in clearness and unsophisticated conviction by the rejection of dogmatical assumptions. For reason is thus confirmed within her own proper province, namely the arrangement of ends, which nevertheless is at the same time an arrangement of nature."²

Freedom of the will must similarly be postulated for the moral life, for without it there could be no categorical *ought*. This is not the place to defend or criticize Kant's *formal* ethics in comparison with hedonism, energism, or any rival school. We are concerned only with his conception of the need and the verification of postulates. The moral law, commanding us to act from motives that are entirely independent of nature (as a mechanical order already developed under phenomenal conditions), must be a law of free beings. We are aware of the criticism that Kant moves here in a circle. He insists that the moral law precludes the operation upon the will of anything but the moral law itself. All action proceeding from a motive seems to be action in which the will is determined by some natural (sensual) impulse. It would seem, therefore, that we must will the moral law without a motive. But Kant solves the dilemma by keeping clearly in mind a distinction between sensuous desires as motives and the single motive of "reverence for the moral law."³ Kant is plainly forced to a pragmatic attitude in this matter of freedom and his break with mechanical causality bears close kinship with the spirit of James. Having specified two kinds of freedom—practical belonging to the phenomenal, and transcendental belonging

¹ Watson, *Selections*, p. 295.

² *Critique of the Paralogisms*, 2d ed., (Mahaffy), III, 288.

³ Watson, *Selections*, p. 229.

to the intelligible world—he ascribes to man not the first only but also the second. Man has the "power of inaugurating a state of things by himself, a spontaneity which can of itself begin to act without the necessity of premising another cause."¹ This sounds like an expression of James's attitude:

Our acts, our turning-places, where we seem to ourselves to make ourselves and grow, are the parts of the world to which we are closest, the parts of which our knowledge is the most intimate and complete. Why should we not take them at their face value? Why may they not be the actual turning-places and growing-places which they seem to be, of the world—why not the workshop of being, where we catch fact in the making, so that nowhere may the world grow in any other kind of way than this?²

God must be postulated as a requisite for the moral life, for without such a supreme cause happiness and morality could not be harmonized; the highest good would be incapable of realization. Reverting again to the first *Critique*:

As we are bound by reason to conceive ourselves as belonging necessarily to such a world, though the senses present us with nothing but phenomena, we shall have to accept the other world as the result of our conduct in this world of sense (in which we see no such connection between goodness and happiness) and therefore as to us a future world. Hence it follows that God and a future life are two suppositions which, according to the principle of pure reason, cannot be separated from the obligation which that very reason imposes upon us.³

In pragmatic phraseology these ideas find their verification in their necessity for the ends which reason must assume for the realization of its highest ideals. But more particularly in the second *Critique*, God is the supremely good and omnipotent will that guarantees the realization of the highest good: "It is only in the ideal of the supreme original good that reason can find the ground of the practically necessary connection of the two elements of the highest derivative good (morality and its corresponding blessedness)."⁴

Probably no part of Kant's work comes nearer to the true pragmatic attitude than his treatment of these religious hypotheses. In regard to religion and ethics pragmatism seems in the rôle of working out thoroughly Kant's problem of the relation of knowledge to faith and the significance of his saying, "I must remove knowledge to make room for faith," is being realized today by such religious thinkers as Ritschl

¹ *Critique of the Paralogisms*, 2d ed., (Mahaffy), III, 371.

² *Pragmatism*, p. 287.

³ Mueller's trans., p. 651.

⁴ *Critique of the Paralogisms*, III, 534.

and Hermann as never before. We may not be able to find in Kant knowledge in all spheres reduced to something like faith—as has been charged to be the design of pragmatism—but in the sphere of religious conviction the parallel seems to be complete. It may appear that the mantle of Kant has fallen upon the pragmatist rather than upon the neo-Hegelians. Kant says explicitly: "It is absolutely needful that one be convinced of the existence of God; but it is not needful that one demonstrate it. What way of conviction is there apart from logical proof? That of the moral courage of conviction."¹ The marked similarity of this to the Ritschlian contention that religion is not derived from our knowledge of God, but rather from our human need which reaches out for a supply, need scarcely be emphasized. Kant practically "rests his case" for the proof of God on this great fact that the concept gives to the moral law a dynamic. He holds that the concept of God does not pertain to physics but to morals: "If a physicist takes refuge in God as the author of things, it is a confession that he has come to an end with his philosophy."² It is from the practical point of view that the concept of God has its great significance. It gives the human heart peace and security. The world of feeling cannot hold together without its dominant, unifying power. It is an emotional necessity.

The close correspondence of Kant's conception of God with pragmatic thought may be traced in the debates, the cross-fire of question and answer that has been running through current philosophical journals. John E. Russel's reply to O. C. Quick in defense of pragmatism (which Russel confesses he long misunderstood) is almost a verbal paraphrase or expansion of Kant's words: "What content of truth is there left in his idea of God, when there has been subtracted from that idea all that connotes value for our human lives in the way of putting us into experientially good relations with God, such as trust, reverence, obedience, expectancy, satisfied wants?"³ Kant is explicitly emphatic in more than one place in disclaiming any objective reality of God to which our idea can correspond in any other way than that which signifies that these expressions stand for "concrete experiences of realized purposes, satisfied wants, sustained moral endeavors, comforted sorrows, harmonized discords in thoughts or feelings, and the peace of mind that comes when our total experiences are brought into unity."⁴ It is not Kant, then, who has been short-circuited, but idealistic systems since Kant. It is just Kant's moral and religious attitude that is now being reproduced

¹ Hartenstein, *Kant*, II, 205.

² Dialectic 7 (Paulsen, *Kant*, p. 288).

³ *Mind*, XXXV, 548.

⁴ *Ibid.*, p. 549.

and intensified in the conviction that life and action are deeper than logical processes, or rather that logical processes take their rise from these. Thought begins when life furnishes the data and there is nothing deeper in cognition than the fundamental needs, interests, and instincts of the mind or rather the life. "Religion does not originate in thought, but in what we experience." Kant freed practical faith from rationalism, as he planned to do, and opened to religion a free field for development in life and action. Pragmatism follows his lead in giving to our moral and religious instincts right of way. The growing conviction among religious thinkers that their chief concern is not in creedal statements but in conduct and that religion finds its great test there, is in the direct line of Kant's influence. Value, need, endeavor—these are the words that ring the changes. There is scarcely anything farther from the truth than the feeling in some circles that the pragmatic attitude makes for irreverence toward "the eternal verities," however that phrase may be explained, or than the consequent disposition in the same circles to turn back to idealistic systems for a fancied support and refuge for waning orthodox standards of religious faith. It is pragmatism with its open door for belief and strenuous effort—effort encouraged by the conviction that our earnest lives count for something, change something, really establish something; that the world is in the making and that part of that making is ours, that furnishes a true dynamic for moral and religious conduct.

The one criticism upon Kant here is, again, that his distinction between matters of faith and understanding is too sharp, as it was in the contrast of sense and understanding. The separation is once more arbitrary and fictitious. Either knowledge will discredit belief or belief, verified in fact, in determining values, must ripen into knowledge. The two are mutually interactive, parts of one and the same process of adjustment and growth. Beliefs as postulates lead to knowledge and practically, therefore, amount to knowledge. They do not occupy a realm to themselves. To say that we take the problem of God out of the cognitive sphere and place it over in the region of voluntarism may serve certain purposes by way of contrast or emphasis, but it discredits the cognitive process too much and does just what the whole pragmatic movement inveighs against and sets itself to correct. So-called pragmatists have themselves fallen into this error. It is possible that Kant meant merely to shift the emphasis from a false intellectualism and certainly his position will tend to check not only absolutism but every form of crude materialistic intellectualism.

Granting that Kant's system seems to point in two directions—toward idealism on one side and toward pragmatism on the other—the idealists, the system-builders who took the first path, confidently re-creating and explaining the world in terms of *thought* until they reached the denial of the very starting-point of criticism, courageously holding that “in the self-comprehension of the idea in the form of a concept the entire evolution of the world has reached its goal,” should have noted the later date of the second *Critique*. The second path which leads away from any “logical autocracy,” which regards the intellect as only one of the factors in the life-process, which clears the way for the categories of our volitional nature, would seem to hold a more direct lineage from Kant in the maturity of his thought.

THINGS-IN-THEMSELVES

In Kant's contrast of things-in-themselves with appearances we have the climax of the contradiction between the transcendental and the functional and the most serious gap between him and modern pragmatism. It is hopeless to seek to eliminate the transcendental or even the transcendent from Kant's system without eliminating Kant himself. That *Dinge an sich* exist as the background of reality and the real cause of our sensations was undoubtedly his thought. Yet it is doubtful if, because of this fact, full justice has been done to the impetus which the Kantian movement gave to the modern functional conception of reality.

Kant holds that all knowable reality, all objects dependable for verification, fall within experience. His own criticism of ontology would apply legitimately to his *Dinge an sich*, for in accordance with his whole examination of knowledge he would agree with the pragmatist in asking what really significant and verifiable meaning can things, objects, existences have if the pragmatic meaning is rejected? As Kant would phrase it, if the categories cannot be applied to things-in-themselves, what meaning can they have? He never consciously and explicitly looked this question in the face in its positive aspect or he would have realized that *true* reality may be given in just this experience which he has labored to account for; that *real* objects as well as phenomenal exist only as they enter into our activity, our experience.

Now it might conceivably be held, as Raub suggested,¹ that some pragmatists would not deny the existence of things-in-themselves and, in that case, there would be no break, for Kant teaches throughout that we do not, in our intellectual activity, deal with them at all, expect in a negative way. Such pragmatists would scarcely be advanced one whit beyond the great German. Kant was alive to the fact that the problem of knowledge, as he inherited it, involved two distinct questions—the possibility of a reference to reality lying beyond the experience of the one who knows and existing on its own account and, on the other hand, the nature of knowledge as an experience and the peculiar part played within it by the sensuous data and the governing principles of thought, respectively. We have assumed throughout this study that pragmatic standards necessitate the uniting of the two.

¹ *Studies in Phil. and Psych.* (Garman Memorial Volume), p. 214.

To say, "Pragmatism does not deny their existence, but it does not discuss the question,"¹ that we know nothing of ultimate realities and turn them over to metaphysics, is a cavalier dodge of real difficulties and would, of course, square up Kant immediately. Unfortunately, this does not suffice. Pragmatism, no more than Kant, can leave the metaphysical question alone. To place external reality as a "chaos" off by itself gets no farther than to leave it as an "unknown." Just as with Kant, so with such pragmatists one may ask: If the mind is incapable of judging as to the nature of external reality, on what grounds can such a "chaos" be posited? To turn over to metaphysics any residual question would seem to mean, if we analyze out the attitude expressed by the phrase, that there is, after all, some distinct, separate region of thought and existence, some sphere of ontology, beyond the range of our problems. But this would be to continue the false separation of worlds against which the pragmatic movement has launched its whole force. It would be Kant's mistake implicitly repeated. As a pause in reading is as significant, for meaning, as the pronouncing and grouping of phrases, so in our systematic treatment of problems of philosophy a break or abrupt stopping-place, with the implication that we should go on if we could, would imply again an ultimate reality non-experiential. If Raub and those he represents mean simply that Kant and pragmatists alike have turned away from empty debates about the void where thinking ceases, very good, but we have moved no farther than we were. For pragmatists who "do not deny their existence but do not discuss the matter" no better statement could be asked than Kant's. Indeed his position has well been cited as fortifying an attitude of antipathy to pure intellectualism:

The conception of a noumenon is not self-contradictory; for we cannot say that sense is the only possible mode of perception. . . . We give the name of noumena to all objects to which sensuous perception does not extend, just for the purpose of showing that such knowledge is not all that the understanding can think. Yet in the end we have to acknowledge that we cannot understand even the possibility of such noumena, and that the sphere of knowledge which we thus reserve beyond the sphere of phenomena is for us quite empty. In short, we have an understanding that *problematically* extends beyond the phenomenal, but no perception and not even the conception of a possible perception of objects beyond the sphere of sense, on which the understanding might be used assertorially. . . . If we choose to call it a noumenon, in order to show that we do not represent it as sensuous, we are at liberty to do so. But

¹ *Studies in Phil. and Psych.* (Garman Memorial Volume), p. 214.

as we cannot apply to it any one of the categories, the conception of it is for us quite empty and meaningless.¹

Just to leave things-in-themselves alone, what more is needed than this? But, as Bergson remarks, if we know nothing of things-in-themselves, "How can we affirm their existence even as problematic? If the unknowable reality projects into our perceptive faculty a sensuous manifold, capable of fitting into it exactly, is it not by that very fact in part known?"²

Again, as to our possible attitude toward these unwieldy things-in-themselves, opponents of pragmatism might defend the view that certain pragmatists—notably James—maintain at times a naïve realism and that in this respect Kant has the advantage of them for an ultimate philosophical system. Such expressions in the pragmatist may, however, justly be regarded as terminology inspired by their perfervid opposition to absolutism. The real connection of pragmatism at this point is probably to be found in its voluntaristic elements, the historical transmission of which may be taken as coming from Kant through Schopenhauer. As for realism and idealism, neither Kant nor the pragmatist need deny his obligation to the former for the working distinction between thing and idea nor to the latter for the conception of the dependence of our reality upon our thought. Pragmatism is only "a new name for old ways of thinking." The pragmatist would insist, however, that this dependence of reality upon our thought be understood in a voluntaristic sense.

In the doctrine of a constructed experience we have the starting-point, at least, of a conception of reality which, while it has not been thoroughly elaborated, may justly be attributed in large measure to Kant's influence. The legitimate consequences of Kant's position would prevent his making any assertions—positive or negative—lending strength to either a realistic or absolutistic definition of reality. It may be proper to mention again that Kant disowned "idealism proper," regarding it as an "extravagant" doctrine. He held that we cannot determine reality by the understanding alone:

The position of all true idealists, from the Eleatics down to Bishop Berkeley, is contained in the following statement: All knowledge acquired through the senses is a mere illusion, and the truth exists only in the ideas furnished by pure understanding and reason. The principle that governs and determines the

¹ Meiklejohn's trans., pp. 187, 206.

² *Op. cit.*, p. 205.

whole of my idealism is, on the contrary, that any knowledge of things that proceeds from pure understanding or reason is a mere illusion, and that truth is found in experience alone.¹

In thus disclaiming the power of ideas to reach *intuitively* real being, as Descartes, Malebranche, and Leibnitz held, and limiting them to a *formal* application, the function of merely providing the laws which connect phenomena and bring unity into the multiplicity of experience, he gives us a point of differentiation from absolute idealism and starts us on the road to pragmatism, at any rate. Caird was right in saying:

The legitimate development of Criticism involves the final rejection of the thing-in-itself. How can anything come within consciousness which is essentially different from consciousness? How can we think that which, *ex hypothesi*, is unthinkable? How can thought discern its own absolute limits without emancipating itself from them? How can it know the phenomenal as such, without a glimpse of the noumenon?²

But the pragmatist would deny that it necessarily follows that we are "carried onward from transcendental to absolute idealism."³

The truth is that the problem of things-in-themselves is not Kant's real problem at all. It is a rationalistic heirloom which, for the comparison of Kant with pragmatism or for any significant study, must be locked away in the "Museum of Curios." Yet to draw as near as possible to the real meaning of Kant as against the absolutist we may notice that his handling of matter or substance (formerly about synonymous with the ultimate substrate) is more dynamic, even when we hold him to the literal word, than that of precedent absolutists like Spinoza or modern idealists like Hegel or Bradley. We have already seen his functional treatment of the ego or soul which Descartes made a part of real substance. When he comes to deal with matter in a scientific way he gives a dynamic theory of it. The laws of matter and motion correspond to the laws of thought established in his first *Critique*—laws of conservation, inertia, action and reaction, and continuity.⁴ It seems highly significant that in dealing with substance he treats these not as laws of an absolute reality at all, of a material substance outside the mind, but merely as constant relations between phenomena in space and time. Here, too, the mind, by its forms and categories, constructs an objective world governed by its own laws. When we contrast this

¹ *Prolegomena*, p. 147.

² *The Philosophy of Kant* (one vol. work), p. 652.

³ *Ibid.*

⁴ *Metaphysische Anfangsgründe der Wissenschaft*, III, "Mechanics."

treatment of *substance* itself with that of the metaphysicians of his day we seem to get means of differentiation that afford food for thought as indicating in what direction Kant is pointing, if we are seeking to understand the real spirit of his philosophy.

Kant and the pragmatist agree that the only reality we can definitely know is a reality either given in or constructed in experience. Pragmatism, of course, is not committed to saying that we *know* reality at all, but rather that our knowledge is one of the functions in reality. Knowledge is not a process of referring to something external. It is a process going on within the object. And we have been seeking to emphasize the significant fact that, in contradistinction from the rationalists who made light of experience as confused knowledge, or as mere appearance, to use Bradley's phrase, Kant is really concerned to prove just the reality of the world as it appears to us. His point of view is that of science, seeking to establish the validity of our knowledge of phenomena.

In connection with this is the further fact, also pregnant with pragmatic meaning, that he rejects the overemphasis upon pure intellectualism that had been current since the dawn of the Renaissance. In contending for the worth of man as determined more by his will than by the understanding, he foreshadowed the attitude of the pragmatist and suggested hints, not elaborated to be sure, of the real dynamic character of reality. It was from him that Schopenhauer took his interpretation of the relations between *Dinge an sich* and phenomena which is approached by the viewpoint of such thinkers as Schiller.

It was notably Fichte who showed that things-in-themselves are really inconsistent with Kant's presuppositions. In comment upon Fichte's attitude Jacobi declared that we cannot enter Kant's system without things-in-themselves and we cannot remain in it if we retain them. The latter remarked with pungent wit that Kant's thing-in-itself "as in itself real, but unknown and unknowable by us enjoys a position of *otium cum dignitate*."¹ We may add that it is little better than non-existence. Once more Kant remarks: "The transcendental object, which may be the ground of this appearance which we call matter is a mere somewhat, and we could not understand what it is even if someone could tell us."² Kant would seem to agree with Fullerton, that "The only external world about which it can be profitable to talk at all is an external world revealed in experience."³ Pragmatism

¹ *Werke*, III, 74.

² Meiklejohn's trans., p. 380.

³ *Mind*, XXXIV, 380.

scarcely goes farther than to assume that an external world about which it is not profitable even to talk does not exist for any inquiry or interest.

How shall we, on Kant's own principles, pass from ideas to things-in-themselves? Kant assumes that the latter affect us and that sensations as effects point back to ultimate things as causes. But he has himself made this impossible by granting to the law of causality only empirical validity. Absolute phenomenalism, rather than absolute idealism, would be a truer inference from his system if we must be pushed on to absolutism of any sort. As Raub says, "In the final analysis the phenomena are really noumena. Truth with Kant as with the pragmatist is necessarily a relation between different parts of experience."¹ Our world of ideas constitutes our only reality. But this does not involve Berkeleyan idealism or any other kind necessarily. It remained for pragmatism to clear up some of the obscurity in this word *ideas*, combining with it, as did Schopenhauer, the significance of the end-striving or volitional aspects of our mental life. Ideas are not entities with an existence of their own. There are no such things as pure mental states. Ideas are a part of the practical life-process, or in other words of developing reality itself. The meaning of ideas is to be sought in the conditions, actual or prospective, of our struggle to live and develop. Similarly our judgments arise from activity and are true if they *work* for the attainment or the alteration of experienced values. "The truth of a state of mind means the function of a leading that is worth while." This is what ideas, thinking, are for. Consequently no object may properly be said to exist except as it enters or may enter into our experience for good or ill.

Pragmatism shows that our knowledge is not, to use Kant's own unfortunate illustration, like an island standing in a boundless and impenetrable ocean of reality, from which it is forever shut off by a mist or fog. Our ever-growing experience and our experienced relations with other beings are reality itself. The real is just what we experience it as in our absorption and assimilation of it as our knowledge and life expand. Schiller holds, as did Kant, that we help make the outer world known to us. Do we also make or alter therewith a reality independent of our knowing? Not *independent*, the pragmatist would answer. We do alter the world. The outer world, whatever that expression may contain, is no more unrelated to us, generally speaking, than is a refreshing summer shower unrelated to the parched vegetation and the suffering humanity to whose relief it comes. Indeed has it not been seriously held

¹ *Op. cit.*, p. 215.

that the restoration of our northern forests might help to bring back and multiply the refreshing showers by the very establishment of need on our side? Both terms of the relation or of the related experience are altered. Thinking is a mode of interacting. We, after knowing, influence the course of the world in other ways than we would have done without our knowledge. The known object is changed by the fact of its being known. It passes by that fact into new relations with other objects. It was one of Kant's great services to show that knowing is not a mere process of revealing objects but rather an act in which we think about them, reflect upon them, and consequently an act partly constitutive and determinative of their character as objects. We cannot speak of independent reality that is merely discovered by our knowledge. Knowing is not an intellectual abstraction but a "prelude to doing." Schiller says the marmots reveal themselves by their anxious whistling before they are as yet really known to the Alpine intruder. They fear being known because this is merely a phase in the course of action that may involve death to them. Even so-called inanimate objects are subject to the same criterion. The awareness of a stone consists in, and is brought about by, its capacity for use in human construction. "To use and to be used includes to know and to be known."

Kant's inherited presuppositions led him to retain a supposed separation of object and ideas, of experience as we have it and reality itself. He retained this separation as an empty form back in his thought, much as people who have outgrown their religious creeds retain them in an isolated region of their minds, if we may be allowed so faulty an expression. Technically, with Kant, thought remains a merely subjective principle whose function is exhausted in bringing order and unity into consciousness—order and unity assumed without a standard. Ideas are restricted to phenomena. Technically, such an experience as this affords would not be real experience at all, but a matter of mere representations. But the spirit of Kant's philosophy goes beyond this separation. It is through the interpretation, criticism, and completion of his doctrine that we have come to see the true nature of experience, the true function of ideas as that of connecting mind with objects. We do not have a subject here and an object there, the mind on one side and things on the other. Experience is a real thing itself, a concrete expression of reality, in which subject and object play their organic parts. In the language of J. E. Creighton:

¹ *Studies in Humanism*, p. 443.

Not only is there no object without a subject, but it is equally true that there is no subject without an object. There is no independent object outside of thought, and there is no *thought-in-itself* standing apart and in abstraction from the contents of experience and entering into only occasional relations to this content. We do not have first a mind and then become conscious of our relations to objects, but to *have a mind* is just to stand in those self-conscious relations to the objective realities?¹

We can readily understand how hard it was for Kant to break away from this dualism when we see not only the representational theory of knowledge that goes with crude realism but also the interaction view of mind in modern psychology harboring the same conception of a "consciousness thing, shut up within itself, and related to other independently existing things." Even the theory of parallelism in psychology, while seeking to avoid metaphysical difficulties, still treasures unconsciously the view of two separate entities. Pragmatism, while not claiming absolute novelty in this respect, has done good service in revising all philosophical presuppositions regarding the functions of subject and object in experience. And it is just one of Kant's permanent contributions to have shown that subject and object develop from within experience itself. His failure to give to experience the extensive range which properly belongs to it as embracing reality in itself does not lessen the value of this contribution, for it is evident that the experience which he really treasured in his deepest meaning is the same experience which modern pragmatism accepts, not merely as phenomenal, but as reality itself. Kant's real center of gravity falls, as does that of the pragmatist, within the mind's activity, or better, within the activity of social individuals, with objects entering as real and constitutive elements into its nature.

Pragmatism is indebted in some measure, as has been said, to Schopenhauer, whose voluntaristic terminology strove at least to separate freedom, causality, and the unity of all life from rationalistic or intellectualistic ingredients—to recognize purposive factors in our mental life. Pragmatists are even more averse than was he to the *Hegelian use of ideas*, as the wrong line of development from Kant, to evolve and perfect his true meaning. Pragmatism accepts voluntarism, but combines it with empiricism, with a true scientific attitude. This is not the old materialistic empiricism which in its way was as dogmatic as rationalism, for pragmatism recognizes no real bodies as fixed data any more than it accepts categories forged and "fulminated before nature began." Pragmatism constantly introduces the criteria of values. Indeed all existential judgments are subjected by its method to this

¹ *Philosophical Review*, XII, 600.

touchstone and become in the end judgments of value. It is in bridging the gap between Kant and empiricism that one of the chief services of pragmatism is to consist. Empiricism has always labored hard over Kant's position and has never been able to concede that the outer world is not found by and taken up into our consciousness fixed and given, but is partly created by our apparatus of perception. Empiricism has fostered the illusion of the *tabula rasa*. It has failed to do justice to the activity of the organism in the act of knowing, to the fact that we do not merely receive and record but that we react in modes decided by our own nature and directed toward the accomplishment of our own ends or ideals. It was this fault that led Kant to abandon the attitude of empiricism which for a time he had espoused, and to look for its corrective. In swinging too far toward the other pole he was unable to appreciate the dynamic and changing character of the mind's reaction and the fact that it reacts as one whole. The functional view of mind and reality dissolves the parallelism or dualism that prevailed a quarter of a century ago, but not by again assuming a fixed datum to which all else must adjust itself and leaving unsolved the old question of how this can be related to mind. Pragmatism essays the interpretation of reality in terms of the whole circle of human needs and ideals. It is Dewey's reflex-arc concept again, carried out to its completest application. To do this, it insists, we need not have resort to absolute idealism with its speculative entities.

Pragmatism would turn to social psychology for an attempt to define reality, if reality must be defined. Our ideas are social products, our recognized realities are social achievements and they are just what they are to the social consciousness. This does not remove or restrict any of the implications that are secured by other philosophic creeds or systems. Some are concerned about such portions of reality as do not come within immediate experience—prehistoric events, whorls of star dust, molten rock a thousand years ago. What about the whole of reality and how about knowing reality completely? The postulates of immediate experience do not exclude reality that transcends individual human consciousness. They simply correlate reality with the consciousness of humanity in all its scope and possibilities. To those who clamor for a still more transcendent reality pragmatism stands with its unconquered challenge—What other meaning has reality than that which is revealed in social consciousness? And this challenge is not only compatible with the essence of Kant's work, but, as we have seen, is almost a liberal paraphrase of his own terminology.

BIBLIOGRAPHY

- ARMSTRONG, A. C. *Transitional Eras in Thought*.
 BALFOUR, A. J. *The Foundations of Belief*.
 BALDWIN, JAMES MARK. *Development and Evolution; Thought and Things, or Genetic Logic*.
 BAWDEN, H. HEATH. *The Principles of Pragmatism*.
 BERGSON, HENRI. *Creative Evolution; Matter and Memory*.
 BERNARD and MAHAFFY. *Kant's Critique of Pure Reason Explained and Defended; Kant's Prolegomena*.
 BOUSSET, WILHELM. *What Is Religion?*
 BRADLEY, F. H. *Appearance and Reality*.
 CAIRD, EDWARD. *Kant's Critical Philosophy* (one volume); *The Critical Philosophy of Kant* (two volumes).
 CALKINS, MARY WHITON. *The Persistent Problems of Philosophy*.
 CARUS, PAUL. *Kant's Prolegomena; Kant and Spencer*.
 CLIFFORD, W. K. *Lectures and Essays*.
 COE, GEORGE A. *Methodist Review*, 1908 (Nashville).
 DELAGUNA, THEODORE and GRACE ANDRUS. *Dogmatism and Evolution*.
 DEWEY, JOHN. *How We Think; Influence of Darwin on Philosophy; Studies in Logical Theory*.
 DEWEY and TUFTS. *Ethics*.
Essays Philosophical and Psychological in Honor of William James.
 FALCKENBERG, RICHARD. *History of Modern Philosophy*.
 FISCHER, KUNO. *Immanuel Kant und seine Lehre* (two volumes).
 FOSTER, GEORGE BURMAN. *The Finality of the Christian Religion*.
 FULLERTON, GEORGE STUART. *An Introduction to Philosophy; Mind*, XXXIV; *The World We Live In*.
 Garman Memorial Volume—*Studies in Philosophy and Psychology*: LYMAN, EUGENE WILLIAM, *The Influence of Pragmatism upon the Status of Theology*; RAUB, WILLIAM LONGSTRETH, *Pragmatism and Kantianism*.
 GREEN, T. H. *Prolegomena to Ethics*.
 HARTENSTEIN. *Kant*.
 HERMANN, E. *Eucken and Bergson*.
 HÖFFDING, HARALD. *The Philosophy of Religion; The Problems of Philosophy*.
 HUME, DAVID. *Inquiry Concerning Human Understanding; A Treatise of Human Nature* (L. A. Selby-Bigge).

- HOWISON, G. H. *The Limits of Evolution*.
 JACOBI, HEINRICH. *Werke*, III.
 JAMES, WILLIAM. *A Pluralistic Universe; Essays in Radical Empiricism; The Meaning of Truth; The Principles of Psychology* (two volumes); *Pragmatism; Some Problems of Philosophy; The Will-to-Believe and Other Essays*.
 JANET and SÉAILLES. *History of the Problems of Philosophy*.
Journal of Philosophy, Psychology and Scientific Methods (1905-12).
 JUDD, C. H. *Psychology*.
 KANT, IMMANUEL. *Cosmogony* (W. Hastie); *Critiques* (see translations); *Metaphysische Anfangsgründe der Wissenschaft; Prolegomena* (see translations).
 LADD, GEORGE TRUMBULL. *Philosophy of Knowledge; Psychology Descriptive and Explanatory*.
 LOBACHEWSKY, N. *New Principles of Geometry with a Complete Theory of Parallels*. (Edition of Bruce Halstead.)
 MEIKLEJOHN. Translation of Kant's *Critique*.
 MILL, JOHN STUART. *Logic* (Harper).
Mind, Vols. XXXIV-XXXVI.
 MOORE, ADDISON W. *Pragmatism and Its Critics; The Functional versus the Representational Theories of Knowledge in Locke's Essay*.
 MORRIS, GEORGE S. *Kant's Critique of Pure Reason, A Critical Exposition*.
 MUELLER, F. MAX. *Kant's Critique of Pure Reason Translated*.
 PAULSEN, FRIEDRICH. *Immanuel Kant; Introduction to Philosophy; System of Ethics*.
 PERRY, R. B. *The Approach to Philosophy*.
 PFLEIDERER, OTTO. *Religion and Historic Faiths*.
Philosophical Review, Vols. XIII-XXI.
 PRATT, JAMES BISSETT. *What Is Pragmatism?*
 RIBOT, TH. *The Evolution of General Ideas*.
 ROGERS, ARTHUR KENYON. *Modern Philosophy; Student's History of Philosophy*.
 ROYCE, JOSIAH. *The Religious Aspect of Philosophy; The Spirit of Modern Philosophy; The World and the Individual* (two volumes).
 SCHILLER, F. C. S. *Essays in Personal Idealism, "Axioms as Postulates"; Humanism; Riddles of the Sphinx; Studies in Humanism*.
 SETH, ANDREW. *Man's Place in the Cosmos*.
 STURT, HENRY. *Essays in Personal Idealism; Idola Theatri*.
 TAYLOR, A. E. *Elements of Metaphysics*.

TUFTS, JAMES H. *Kant's Teleology* (1892); *The Individual and His Relation to Society*.

WALLACE WILLIAM. *The Logic of Hegel*.

WARD, J. *Naturalism and Agnosticism*.

WATSON, JOHN. *Kant and His English Critics; Selections from Kant; The Philosophy of Kant Explained* (1909).

WEBER, ALFRED. *History of Philosophy*.

WENLEY, R. M. *Kant; Modern Thought and the Crisis in Belief*.

WINDELBAND, W. *History of Ancient Philosophy; History of Modern Philosophy* (German); *History of Philosophy* (Tufts).

WITHERS, JOHN W. *Euclid's Parallel Postulate*.

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